



PDC Energy

Schlumberger

Rev 2

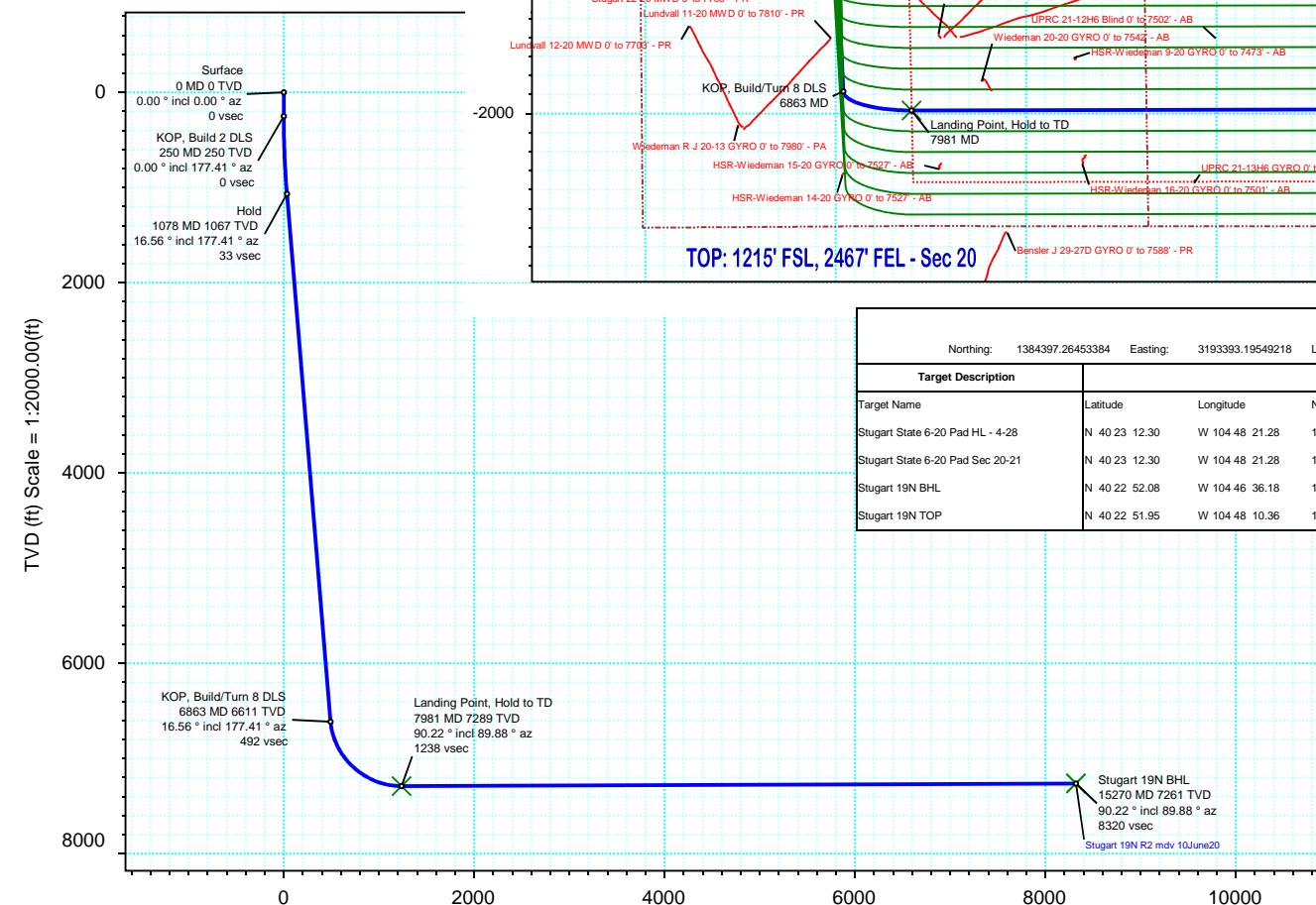
Borehole:	Well:	Field:	Structure:
Original Hole	Stugart 19N	CO, Weld County (NAD 83 NZ) - SRC	PDC Energy 20-05N-66W (Stugart State 6-20 Pad)

Gravity & Magnetic Parameters					Surface Location					NAD83 Colorado State Plane, Northern Zone, US Feet					Miscellaneous			
Model:	HDGM 2020	Dip:	66.728°	Date:	17-Jun-2020	Lat:	N 40 23 11.38	Northings:	1384397.26ftUS	Grid Conv:	0.4486°	Slot:	Stugart 19N	TVD Ref:	KB 4ft(4949ft above MSL)			
MagDec:	8.129°	FS:	52099.57nT	Gravity FS:	999.013mgn (9.80665 Based)	Lon:	W 104 48 20.69	Easting:	3193393.2ftUS	Scale Fact:	0.99995964	Plan:	Stugart 19N R2 mdv 10June20					

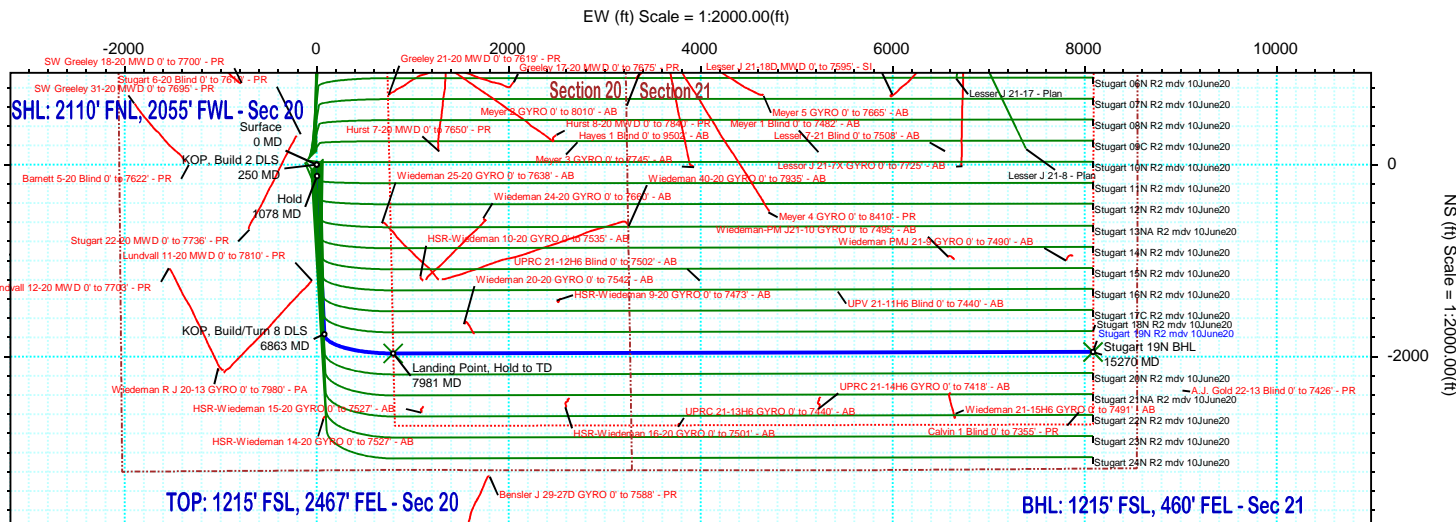
Proposal



True North  
Tot Corr (M->T 8.129°)  
Mag Dec (8.129°)  
Grid Conv (0.449°)



Vertical Section (ft) Azim = 103.57° Scale = 1:2000.00(ft) Origin = 0N/-S, 0E/-W



Surface Location																			
Northing:		1384397.26453384		Easting:		3193393.19549218		Latitude:		N 40 23 11.38		Longitude:		W 104 48 20.69		VSec Azimuth:		103.57	
Target Description		Grid Coord								Local Coord									
Target Name		Latitude		Longitude		Northing		Easting		TVD		VSec		N(+)/S(-)		E(+)/W(-)			
Stugart State 6-20 Pad HL - 4-28		N 40 23 12.30		W 104 48 21.28		1384490.53		3193346.78		4949.00		-66.37		93.63		-45.69			
Stugart State 6-20 Pad Sec 20-21		N 40 23 12.30		W 104 48 21.28		1384490.53		3193346.78		4949.00		-66.37		93.63		-45.69			
Stugart 19N BHL		N 40 22 52.08		W 104 46 36.18		1382509.07		3201495.68		7261.00		8319.94		-1951.65		8087.79			
Stugart 19N TOP		N 40 22 51.95		W 104 48 10.36		1382437.17		3194207.63		7289.00		1238.09		-1966.49		799.09			

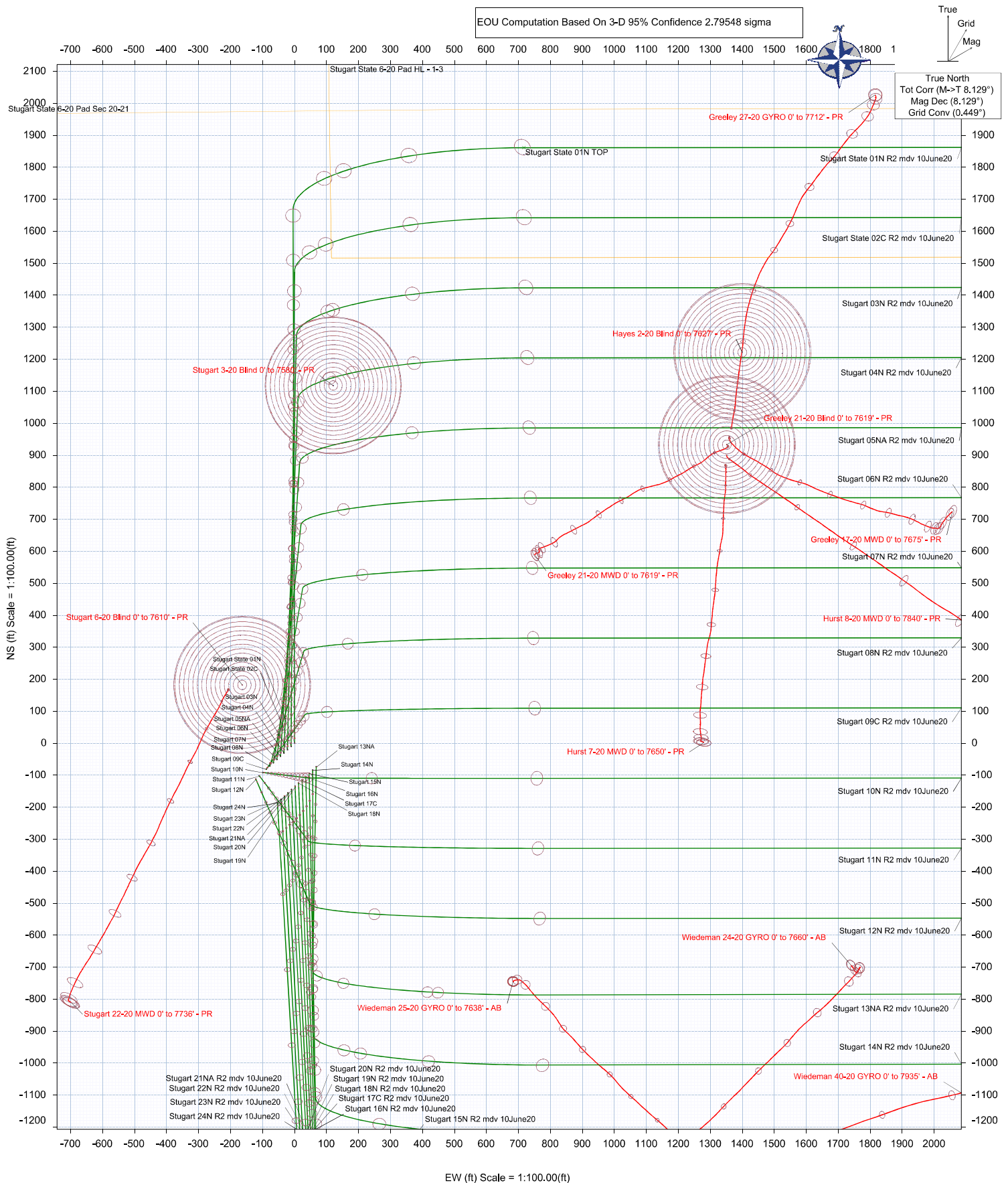
Critical Points									
Critical Point	MD	INCL	AZIM	TVD	VSEC	N(+)/S(-)	E(+)/W(-)	DLS	
Surface	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
KOP, Build 2 DLS	250.00	0.00	177.41	250.00	0.00	0.00	0.00	0.00	
Hold	1078.02	16.56	177.41	1066.54	33.07	-118.71	5.37	2.00	
KOP, Build/Turn 8 DLS	6862.56	16.56	177.41	6611.13	491.88	-1765.76	79.90	0.00	
Landing Point, Hold to TD	7981.38	90.22	89.88	7289.00	1238.09	-1966.49	799.09	8.00	
Stugart 19N BHL	15270.15	90.22	89.88	7261.00	8319.94	-1951.65	8087.79	0.00	



Borehole:	Well:	Field:	Structure:
Original Hole	Stugart State 01N	CO, Weld County (NAD 83 NZ) - SRC	PDC Energy 20-05N-66W (Stugart State 6-20 Pad)

Gravity & Magnetic Parameters		Surface Location		Miscellaneous	
Model: HDGM 2020	Dip: 66.728°	Date: 17-Jun-2020	NAD83 Colorado State Plane, Northern Zone, US Feet	Stugart State	TVD Ref: KB 4ft(4948ft above MSL)
MagDec: 8.129°	FS: 52099.711nT	Gravity FS: 999.013mgm (9.80665 Based)	Lat: N 40 23 12.71	Slot: 01N	Plan: Stugart State 01N R2 mdv 10June20
			Lon: W 104 48 20.71		
			Northings: 1384531.67HUS		
			Easting: 3193390.47HUS		
			Scale Fact: 0.99995966		

EOU Computation Based On 3-D 95% Confidence 2.79548 sigma

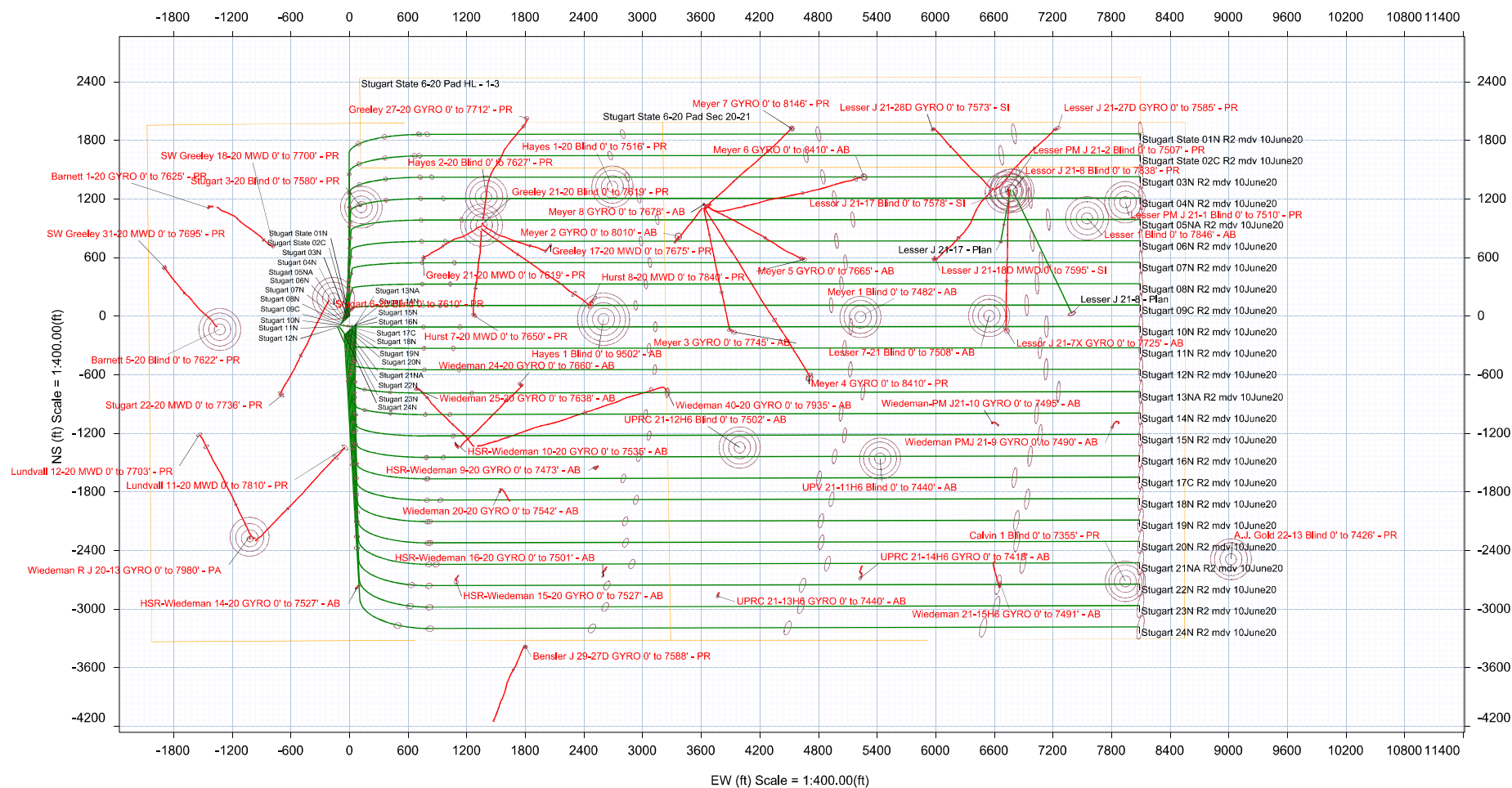




True North  
Tot Corr (M->T 8.129°)  
Mag Dec (8.129°)  
Grid Conv (0.449°)

Borehole:				Well:				Field:				Structure:																			
Original Hole				Stugart State 01N				CO, Weld County (NAD 83 NZ) - SRC				PDC Energy 20-05N-66W (Stugart State 6-20 Pad)																			
Gravity & Magnetic Parameters								Surface Location								Miscellaneous															
Mode:		HDGM 2020		Dip:		66,728°		Date:		17-Jun-2020		Lat:		N 40 23 12.71		Northing:		1384531.67RUS		Grid Conv:		0,4486°		Slot:		Stugart State 01N		TVD Ref:		KB 4R(4948ft above MSL)	
MagDec:		8,129°		FS:		52099.711N		Gravity FS:		999.013man (3,00665 Based)		Lon:		W 104 48 20.71		Easting:		3193390.47RUS		Scale Fact:		0.99995966		Plan:		Stugart State 01N R2 mdy 10June20					

EOU Computation Based On 3-D 95% Confidence 2.79548 sigma



## Stugart 19N R2 mdv 10June20 Proposal Geodetic Report

(Def Plan)

**Report Date:** June 19, 2020 - 10:36 AM  
**Client:** PDC Energy  
**Field:** CO, Weld County (NAD 83 NZ) - SRC  
**Structure / Slot:** PDC Energy 20-05N-66W (Stugart State 6-20 Pad) / Stugart 19N  
**Well:** Stugart 19N  
**Borehole:** Original Hole  
**UWI / API#:** Unknown / Unknown  
**Survey Name:** Stugart 19N R2 mdv 10June20  
**Survey Date:** September 25, 2019  
**Tort / AHD / DDI / ERD Ratio:** 106.066 ° / 9836.434 ft / 6.340 / 1.349  
**Coordinate Reference System:** NAD83 Colorado State Plane, Northern Zone, US Feet  
**Location Lat / Long:** N 40° 23' 11.37840", W 104° 48' 20.68920"  
**Location Grid N/E Y/X:** N 1384397.265 ftUS, E 3193393.195 ftUS  
**CRS Grid Convergence Angle:** 0.4486 °  
**Grid Scale Factor:** 0.99995964  
**Version / Patch:** 2.10.811.0

**Survey / DLS Computation:** Minimum Curvature / Lubinski  
**Vertical Section Azimuth:** 103.567 ° (True North)  
**Vertical Section Origin:** 0.000 ft, 0.000 ft  
**TVD Reference Datum:** KB 4ft  
**TVD Reference Elevation:** 4949.000 ft above MSL  
**Seabed / Ground Elevation:** 4945.000 ft above MSL  
**Magnetic Declination:** 8.129 °  
**Total Gravity Field Strength:** 999.0131mgn (9.80665 Based)  
**Gravity Model:** GARM  
**Total Magnetic Field Strength:** 52099.570 nT  
**Magnetic Dip Angle:** 66.728 °  
**Declination Date:** June 17, 2020  
**Magnetic Declination Model:** HDGM 2020  
**North Reference:** True North  
**Grid Convergence Used:** 0.0000 °  
**Total Corr Mag North->True North:** 8.1294 °  
**Local Coord Referenced To:** Well Head

Comments	MD (ft)	Incl (°)	Azim True (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (°)	Longitude (°)
Surface	0.00	0.00	0.00	0.00	0.00	0.00	0.00	N/A	1384397.26	3193393.20	40.386494	-104.805747
	100.00	0.00	177.41	100.00	0.00	0.00	0.00	0.00	1384397.26	3193393.20	40.386494	-104.805747
	200.00	0.00	177.41	200.00	0.00	0.00	0.00	0.00	1384397.26	3193393.20	40.386494	-104.805747
KOP, Build 2 DLS	250.00	0.00	177.41	250.00	0.00	0.00	0.00	0.00	1384397.26	3193393.20	40.386494	-104.805747
	300.00	1.00	177.41	300.00	0.12	-0.44	0.02	2.00	1384396.83	3193393.22	40.386493	-104.805747
	400.00	3.00	177.41	399.93	1.09	-3.92	0.18	2.00	1384393.34	3193393.40	40.386483	-104.805746
	500.00	5.00	177.41	499.68	3.03	-10.89	0.49	2.00	1384386.38	3193393.77	40.386464	-104.805745
	600.00	7.00	177.41	599.13	5.94	-21.33	0.97	2.00	1384375.94	3193394.33	40.386435	-104.805744
	700.00	9.00	177.41	698.15	9.82	-35.23	1.59	2.00	1384362.05	3193395.07	40.386397	-104.805741
	800.00	11.00	177.41	796.63	14.65	-52.58	2.38	2.00	1384344.71	3193395.99	40.386350	-104.805738
	900.00	13.00	177.41	894.44	20.43	-73.35	3.32	2.00	1384323.95	3193397.09	40.386293	-104.805735
	1000.00	15.00	177.41	991.46	27.16	-97.52	4.41	2.00	1384299.79	3193398.37	40.386226	-104.805731
Hold	1078.02	16.56	177.41	1066.54	33.07	-118.71	5.37	2.00	1384278.61	3193399.50	40.386168	-104.805728
	1100.00	16.56	177.41	1087.61	34.81	-124.97	5.66	0.00	1384272.35	3193399.83	40.386151	-104.805727
	1200.00	16.56	177.41	1183.46	42.74	-153.44	6.94	0.00	1384243.89	3193401.34	40.386073	-104.805722
	1300.00	16.56	177.41	1279.31	50.68	-181.92	8.23	0.00	1384215.43	3193402.85	40.385995	-104.805717
	1400.00	16.56	177.41	1375.16	58.61	-210.39	9.52	0.00	1384186.97	3193404.36	40.385917	-104.805713
	1500.00	16.56	177.41	1471.02	66.54	-238.86	10.81	0.00	1384158.50	3193405.87	40.385838	-104.805708
	1600.00	16.56	177.41	1566.87	74.47	-267.34	12.10	0.00	1384130.04	3193407.38	40.385760	-104.805704
	1700.00	16.56	177.41	1662.72	82.40	-295.81	13.39	0.00	1384101.58	3193408.90	40.385682	-104.805699
	1800.00	16.56	177.41	1758.57	90.33	-324.28	14.67	0.00	1384073.12	3193410.41	40.385604	-104.805694
	1900.00	16.56	177.41	1854.42	98.27	-352.76	15.96	0.00	1384044.66	3193411.92	40.385526	-104.805690
	2000.00	16.56	177.41	1950.28	106.20	-381.23	17.25	0.00	1384016.20	3193413.43	40.385448	-104.805685
	2100.00	16.56	177.41	2046.13	114.13	-409.70	18.54	0.00	1383987.74	3193414.94	40.385369	-104.805680
	2200.00	16.56	177.41	2141.98	122.06	-438.18	19.83	0.00	1383959.28	3193416.45	40.385291	-104.805676
	2300.00	16.56	177.41	2237.83	129.99	-466.65	21.12	0.00	1383930.81	3193417.96	40.385213	-104.805671
	2400.00	16.56	177.41	2333.68	137.92	-495.12	22.41	0.00	1383902.35	3193419.48	40.385135	-104.805667
	2500.00	16.56	177.41	2429.54	145.86	-523.60	23.69	0.00	1383873.89	3193420.99	40.385057	-104.805662
	2600.00	16.56	177.41	2525.39	153.79	-552.07	24.98	0.00	1383845.43	3193422.50	40.384979	-104.805657
	2700.00	16.56	177.41	2621.24	161.72	-580.54	26.27	0.00	1383816.97	3193424.01	40.384900	-104.805653
	2800.00	16.56	177.41	2717.09	169.65	-609.02	27.56	0.00	1383788.51	3193425.52	40.384822	-104.805648
	2900.00	16.56	177.41	2812.94	177.58	-637.49	28.85	0.00	1383760.05	3193427.03	40.384744	-104.805643
	3000.00	16.56	177.41	2908.80	185.51	-665.96	30.14	0.00	1383731.59	3193428.54	40.384666	-104.805639
	3100.00	16.56	177.41	3004.65	193.45	-694.44	31.42	0.00	1383703.13	3193430.05	40.384588	-104.805634
	3200.00	16.56	177.41	3100.50	201.38	-722.91	32.71	0.00	1383674.66	3193431.57	40.384510	-104.805630
	3300.00	16.56	177.41	3196.35	209.31	-751.38	34.00	0.00	1383646.20	3193433.08	40.384432	-104.805625
	3400.00	16.56	177.41	3292.20	217.24	-779.86	35.29	0.00	1383617.74	3193434.59	40.384353	-104.805620
	3500.00	16.56	177.41	3388.06	225.17	-808.33	36.58	0.00	1383589.28	3193436.10	40.384275	-104.805616
	3600.00	16.56	177.41	3483.91	233.10	-836.80	37.87	0.00	1383560.82	3193437.61	40.384197	-104.805611
	3700.00	16.56	177.41	3579.76	241.04	-865.28	39.16	0.00	1383532.36	3193439.12	40.384119	-104.805606
	3800.00	16.56	177.41	3675.61	248.97	-893.75	40.44	0.00	1383503.90	3193440.63	40.384041	-104.805602
	3900.00	16.56	177.41	3771.46	256.90	-922.22	41.73	0.00	1383475.44	3193442.14	40.383963	-104.805597
	4000.00	16.56	177.41	3867.32	264.83	-950.70	43.02	0.00	1383446.97	3193443.66	40.383884	-104.805593
	4100.00	16.56	177.41	3963.17	272.76	-979.17	44.31	0.00	1383418.51	3193445.17	40.383806	-104.805588
	4200.00	16.56	177.41	4059.02	280.69	-1007.64	45.60	0.00	1383390.05	3193446.68	40.383728	-104.805583
	4300.00	16.56	177.41	4154.87	288.63	-1036.12	46.89	0.00	1383361.59	3193448.19	40.383650	-104.805579
	4400.00	16.56	177.41	4250.72	296.56	-1064.59	48.17	0.00	1383333.13	3193449.70	40.383572	-104.805574
	4500.00	16.56	177.41	4346.58	304.49	-1093.06	49.46	0.00	1383304.67	3193451.21	40.383494	-104.805569
	4600.00	16.56	177.41	4442.43	312.42	-1121.54	50.75	0.00	1383276.21	3193452.72	40.383415	-104.805565
	4700.00	16.56	177.41	4538.28	320.35	-1150.01	52.04	0.00	1383247.75	3193454.23	40.383337	-104.805560
	4800.00	16.56	177.41	4634.13	328.28	-1178.48	53.33	0.00	1383219.28	3193455.75	40.383259	-104.805556
	4900.00	16.56	177.41	4729.98	336.22	-1206.96	54.62	0.00	1383190.82	3193457.26	40.383181	-104.805551
	5000.00	16.56	177.41	4825.84	344.15	-1235.43	55.91	0.00	1383162.36	3193458.77	40.383103	-104.805546
	5100.00	16.56	177.41	4921.69	352.08	-1263.90	57.19	0.00	1383133.90	3193460.28	40.383025	-104.805542
	5200.00	16.56	177.41	5017.54	360.01	-1292.38	58.48	0.00	1383105.44	3193461.79	40.382947	-104.805537
	5300.00	16.56	177.41	5113.39	367.94	-1320.85	59.77	0.00	1383076.98	3193463.30	40.382868	-104.805532
	5400.00	16.56	177.41	5209.24	375.87	-1349.32	61.06	0.00	1383048.52	3193464.81	40.382790	-104.805528
	5500.00	16.56	177.41	5305.10	383.81	-1377.80	62.35	0.00	1383020.06	3193466.32	40.382712	-104.805523
	5600.00	16.56	177.41	5400.95	391.74	-1406.27	63.64	0.00	1382991.60	3193467.84	40.382634	-104.805519
	5700.00	16.56	177.41	5496.80	399.67	-1434.74	64.92	0.00	1382963.13	3193469.35	40.382556	-104.805514
	5800.00	16.56	177.41	5592.65	407.60	-1463.22	66.21	0.00	1382934.67	3193470.86	40.382478	-104.805509
	5900.00	16.56	177.41	5688.50	415.53	-1491.69	67.50	0.00	1382906.21	3193472.37	40.382399	-104.805505
	6000.00	16.56	177.41	5784.36	423.46	-1520.16	68.79	0.00	1382877.75	3193473.88	40.382321	-104.805500
	6100.00	16.56	177.41	5880.21	431.40	-1548.64	70.08	0.00	1382849.29	3193475.39	40.382243	-104.805495
	6200.00	16.56	177.41	5976.06	439.33	-1577.11	71.37	0.00	1382820.83	3193476.90	40.382165	-104.805491
	6300.00	16.56	177.41	6071.91	447.26	-1605.58	72.66	0.00	1382792.37	3193478.42	40.382087	-104.805486
	6400.00	16.56	177.41	6167.76	455.19	-1634.06	73.94	0.00	1382763.91	3193479.93	40.382009	-104.805482
	6500.00	16.56	177.41	6263.62	463.12	-1662.53	75.23	0.00	1382735.44	3193481.44	40.381931	-104.805477
	6600.00	16.56	177.41	6359.47	471.05	-1691.00	76.52	0.00	1382706.98	3193482.95	40.381852	-104.805472
	6700.00	16.56	177.41	6455.32	478.99	-1719.48	77.81	0.00	1382678.52	3193484.46	40.381774	-104.805468
	6800.00	16.56	177.41	6551.17	486.92	-1747.95	79.10	0.00	1382650.06	3193485.97	40.381696	-104.805463
KOP, Build/Turn 8 DLS	6862.56	16.56	177.41	6611.13	491.88	-1765.76	79.90	0.00	1382632.26	3193486.92	40.381647	-104.805460
	6900.00	16.95	167.09	6647.00	495.80	-1776.41	81.36	8.00	1382621.62	3193488.46	40.381618	-104.805455
	7000.00	20.18	143.88	6741.91	515.48	-1804.60	94.81	8.00	1382593.54			

Comments	MD (ft)	Incl (°)	Azim True (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (°)	Longitude (°)
	7300.00	38.90	111.55	7003.28	650.19	-1882.13	214.68	8.00	1382516.95	3193622.59	40.381328	-104.804976
	7400.00	46.15	106.53	7076.95	717.40	-1903.96	278.55	8.00	1382495.62	3193686.63	40.381268	-104.804747
	7500.00	53.57	102.61	7141.39	793.75	-1923.04	352.49	8.00	1382477.12	3193760.71	40.381215	-104.804482
	7600.00	61.09	99.39	7195.34	877.77	-1938.99	435.07	8.00	1382461.82	3193843.41	40.381172	-104.804185
	7700.00	68.69	96.60	7237.75	967.80	-1951.51	524.67	8.00	1382450.00	3193933.10	40.381137	-104.803864
	7800.00	76.32	94.09	7267.79	1062.11	-1960.35	619.55	8.00	1382441.91	3194028.05	40.381113	-104.803523
	7900.00	83.98	91.74	7284.88	1158.86	-1965.34	717.87	8.00	1382437.69	3194126.40	40.381099	-104.803170
Landing Point, Hold to TD	7981.38	90.22	89.88	7289.00	1238.09	-1966.49	799.09	8.00	1382437.17	3194207.63	40.381096	-104.802879
	8000.00	90.22	89.88	7288.93	1256.18	-1966.45	817.71	0.00	1382437.36	3194226.24	40.381096	-104.802812
	8100.00	90.22	89.88	7288.54	1353.34	-1966.25	917.71	0.00	1382438.34	3194326.23	40.381097	-104.802453
	8200.00	90.22	89.88	7288.16	1450.50	-1966.05	1017.71	0.00	1382439.33	3194426.23	40.381097	-104.802094
	8300.00	90.22	89.88	7287.78	1547.66	-1965.84	1117.71	0.00	1382440.32	3194526.22	40.381098	-104.801735
	8400.00	90.22	89.88	7287.39	1644.82	-1965.64	1217.71	0.00	1382441.30	3194626.21	40.381098	-104.801376
	8500.00	90.22	89.88	7287.01	1741.99	-1965.44	1317.71	0.00	1382442.29	3194726.20	40.381099	-104.801017
	8600.00	90.22	89.88	7286.62	1839.15	-1965.23	1417.71	0.00	1382443.28	3194826.19	40.381100	-104.800658
	8700.00	90.22	89.88	7286.24	1936.31	-1965.03	1517.71	0.00	1382444.26	3194926.18	40.381100	-104.800299
	8800.00	90.22	89.88	7285.86	2033.47	-1964.82	1617.71	0.00	1382445.25	3195026.17	40.381101	-104.799940
	8900.00	90.22	89.88	7285.47	2130.63	-1964.62	1717.71	0.00	1382446.23	3195126.16	40.381101	-104.799582
	9000.00	90.22	89.88	7285.09	2227.79	-1964.42	1817.70	0.00	1382447.22	3195226.15	40.381102	-104.799223
	9100.00	90.22	89.88	7284.70	2324.95	-1964.21	1917.70	0.00	1382448.21	3195326.14	40.381102	-104.798864
	9200.00	90.22	89.88	7284.32	2422.11	-1964.01	2017.70	0.00	1382449.19	3195426.13	40.381103	-104.798505
	9300.00	90.22	89.88	7283.93	2519.27	-1963.81	2117.70	0.00	1382450.18	3195526.12	40.381103	-104.798146
	9400.00	90.22	89.88	7283.55	2616.44	-1963.60	2217.70	0.00	1382451.17	3195626.11	40.381104	-104.797787
	9500.00	90.22	89.88	7283.17	2713.60	-1963.40	2317.70	0.00	1382452.15	3195726.10	40.381104	-104.797428
	9600.00	90.22	89.88	7282.78	2810.76	-1963.20	2417.70	0.00	1382453.14	3195826.09	40.381105	-104.797069
	9700.00	90.22	89.88	7282.40	2907.92	-1962.99	2517.70	0.00	1382454.13	3195926.08	40.381105	-104.796710
	9800.00	90.22	89.88	7282.01	3005.08	-1962.79	2617.70	0.00	1382455.11	3196026.07	40.381106	-104.796351
	9900.00	90.22	89.88	7281.63	3102.24	-1962.59	2717.70	0.00	1382456.10	3196126.06	40.381106	-104.795992
	10000.00	90.22	89.88	7281.25	3199.40	-1962.38	2817.70	0.00	1382457.08	3196226.05	40.381107	-104.795633
	10100.00	90.22	89.88	7280.86	3296.56	-1962.18	2917.69	0.00	1382458.07	3196326.04	40.381108	-104.795274
	10200.00	90.22	89.88	7280.48	3393.72	-1961.97	3017.69	0.00	1382459.06	3196426.03	40.381108	-104.794915
	10300.00	90.22	89.88	7280.09	3490.89	-1961.77	3117.69	0.00	1382460.04	3196526.02	40.381109	-104.794556
	10400.00	90.22	89.88	7279.71	3588.05	-1961.57	3217.69	0.00	1382461.03	3196626.01	40.381109	-104.794197
	10500.00	90.22	89.88	7279.32	3685.21	-1961.36	3317.69	0.00	1382462.02	3196726.00	40.381110	-104.793838
	10600.00	90.22	89.88	7278.94	3782.37	-1961.16	3417.69	0.00	1382463.00	3196825.99	40.381110	-104.793480
	10700.00	90.22	89.88	7278.56	3879.53	-1960.96	3517.69	0.00	1382463.99	3196925.98	40.381111	-104.793121
	10800.00	90.22	89.88	7278.17	3976.69	-1960.75	3617.69	0.00	1382464.98	3197025.97	40.381111	-104.792762
	10900.00	90.22	89.88	7277.79	4073.85	-1960.55	3717.69	0.00	1382465.96	3197125.96	40.381112	-104.792403
	11000.00	90.22	89.88	7277.40	4171.01	-1960.35	3817.69	0.00	1382466.95	3197225.95	40.381112	-104.792044
	11100.00	90.22	89.88	7277.02	4268.17	-1960.14	3917.68	0.00	1382467.94	3197325.94	40.381113	-104.791685
	11200.00	90.22	89.88	7276.64	4365.34	-1959.94	4017.68	0.00	1382468.92	3197425.93	40.381113	-104.791326
	11300.00	90.22	89.88	7276.25	4462.50	-1959.74	4117.68	0.00	1382469.91	3197525.92	40.381114	-104.790967
	11400.00	90.22	89.88	7275.87	4559.66	-1959.53	4217.68	0.00	1382470.89	3197625.91	40.381114	-104.790608
	11500.00	90.22	89.88	7275.48	4656.82	-1959.33	4317.68	0.00	1382471.88	3197725.90	40.381115	-104.790249
	11600.00	90.22	89.88	7275.10	4753.98	-1959.13	4417.68	0.00	1382472.87	3197825.89	40.381115	-104.789890
	11700.00	90.22	89.88	7274.71	4851.14	-1958.92	4517.68	0.00	1382473.85	3197925.88	40.381116	-104.789531
	11800.00	90.22	89.88	7274.33	4948.30	-1958.72	4617.68	0.00	1382474.84	3198025.87	40.381116	-104.789172
	11900.00	90.22	89.88	7273.95	5045.46	-1958.51	4717.68	0.00	1382475.83	3198125.86	40.381117	-104.788813
	12000.00	90.22	89.88	7273.56	5142.62	-1958.31	4817.68	0.00	1382476.81	3198225.85	40.381117	-104.788454
	12100.00	90.22	89.88	7273.18	5239.79	-1958.11	4917.68	0.00	1382477.80	3198325.84	40.381118	-104.788095
	12200.00	90.22	89.88	7272.79	5336.95	-1957.90	5017.67	0.00	1382478.79	3198425.83	40.381118	-104.787737
	12300.00	90.22	89.88	7272.41	5434.11	-1957.70	5117.67	0.00	1382479.77	3198525.82	40.381119	-104.787378
	12400.00	90.22	89.88	7272.03	5531.27	-1957.50	5217.67	0.00	1382480.76	3198625.81	40.381119	-104.787019
	12500.00	90.22	89.88	7271.64	5628.43	-1957.29	5317.67	0.00	1382481.75	3198725.80	40.381120	-104.786660
	12600.00	90.22	89.88	7271.26	5725.59	-1957.09	5417.67	0.00	1382482.73	3198825.79	40.381120	-104.786301
	12700.00	90.22	89.88	7270.87	5822.75	-1956.89	5517.67	0.00	1382483.72	3198925.78	40.381121	-104.785942
	12800.00	90.22	89.88	7270.49	5919.91	-1956.68	5617.67	0.00	1382484.70	3199025.77	40.381121	-104.785583
	12900.00	90.22	89.88	7270.10	6017.07	-1956.48	5717.67	0.00	1382485.69	3199125.76	40.381122	-104.785224
	13000.00	90.22	89.88	7269.72	6114.24	-1956.28	5817.67	0.00	1382486.68	3199225.75	40.381122	-104.784865
	13100.00	90.22	89.88	7269.34	6211.40	-1956.07	5917.67	0.00	1382487.66	3199325.74	40.381123	-104.784506
	13200.00	90.22	89.88	7268.95	6308.56	-1955.87	6017.66	0.00	1382488.65	3199425.73	40.381123	-104.784147
	13300.00	90.22	89.88	7268.57	6405.72	-1955.66	6117.66	0.00	1382489.64	3199525.72	40.381124	-104.783788
	13400.00	90.22	89.88	7268.18	6502.88	-1955.46	6217.66	0.00	1382490.62	3199625.71	40.381124	-104.783429
	13500.00	90.22	89.88	7267.80	6600.04	-1955.26	6317.66	0.00	1382491.61	3199725.70	40.381125	-104.783070
	13600.00	90.22	89.88	7267.42	6697.20	-1955.05	6417.66	0.00	1382492.60	3199825.69	40.381125	-104.782712
	13700.00	90.22	89.88	7267.03	6794.36	-1954.85	6517.66	0.00	1382493.58	3199925.68	40.381126	-104.782353
	13800.00	90.22	89.88	7266.65	6891.53	-1954.65	6617.66	0.00	1382494.57	3200025.67	40.381126	-104.781994
	13900.00	90.22	89.88	7266.26	6988.69	-1954.44	6717.66	0.00	1382495.55	3200125.66	40.381127	-104.781635
	14000.00	90.22	89.88	7265.88	7085.85	-1954.24	6817.66	0.00	1382496.54	3200225.65	40.381127	-104.781276
	14100.00	90.22	89.88	7265.50	7183.01	-1954.04	6917.66	0.00	1382497.53	3200325.64	40.381128	-104.780917
	14200.00	90.22	89.88	7265.11	7280.17	-1953.83	7017.66	0.00	1382498.51	3200425.63	40.381128	-104.780558
	14300.00	90.22	89.88	7264.73	7377.33	-1953.63	7117.65	0.00	1382499.50	3200525.62	40.381129	-104.780199
	14400.00	90.22	89.88	7264.34	7474.49	-1953.43	7217.65	0.00	1382500.49	3200625.61	40.381129	-104.779840
	14500.00	90.22	89.88	7263.96	7571.65	-1953.22	7317.65	0.00	1382501.47	3200725.61	40.381130	-104.779481
	14600.00	90.22	89.88	7263.57	7668.81	-1953.02	7417.65	0.00	1382502.46	3200825.60	40.381130	-104.779122
	14700.00	90.22	89.88	7263.19	7765.98	-1952.82	7517.65	0.00	1382503.45	3200925.59	40.381131	-104.778763
	14800.00	90.22	89.88	7262.81	7863.14	-1952.61	7617.65	0.00	1382504.43	3201025.58	40.381131	-104.778404
	14900.00	90.22	89.88	7262.42	7960.30	-1952.41	771					

## Stugart 19N R2 mdv 10June20 Anti-Collision Summary Report

**Analysis Date-24hr Time:** June 19, 2020 - 10:54

**Client:** PDC Energy

**Field:** CO, Weld County (NAD 83 NZ) - SRC

**Structure:** PDC Energy 20-05N-66W (Stugart State 6-20 Pad)

**Slot:** Stugart 19N

**Well:** Stugart 19N

**Borehole:** Original Hole

**Scan MD Range:** 0.00ft ~ 15270.15ft

**Analysis Method:** 3D Least Distance

**Reference Trajectory:** Stugart 19N R2 mdv 10June20 (Def Plan)

**Depth Interval:** Every 10.00 Measured Depth (ft)

**Rule Set:** D&M AntiCollision Standard S002 v5.1/5.2

**Min Pts:** All local minima indicated.

**Version / Patch:** 2.10.811.0

**Database \ Project:** localhost\drilling-project1

**Trajectory Error Model:** ISCWSA0 3-D 95.000% Confidence 2.7955 sigma

### Offset Trajectories Summary

#### Offset Selection Criteria

Wellhead distance scan: Not performed!

Selection filters: Definitive Surveys - Definitive Plans - Definitive surveys exclude definitive plans

- All Non-Def Surveys when no Def-Survey is set in a borehole - All Non-Def Plans when no Def-Plan is set in a borehole

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		

Results highlighted: Sep-Factor separation &lt;= 1.50 ft

#### Stugart 18N R2 mdv 10June20 (Def Plan)

Fail Minor

14.90	12.11	13.92	2.79	N/A	MAS = 3.69 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
14.90	12.11	13.92	2.79	N/A	MAS = 3.69 (m)	4.00	4.00					WRP	
14.90	12.11	12.67	2.79	11.19	MAS = 3.69 (m)	290.00	290.00					MinPt-O-SF	
14.90	12.11	12.67	2.79	11.18	MAS = 3.69 (m)	300.00	300.00					MINPT-O-EOU	
14.35	12.11	9.15	2.23	3.17	MAS = 3.69 (m)	1000.00	991.46					MinPts	
14.53	12.11	6.97	2.42	2.96	MAS = 3.69 (m)	1040.00	1030.03					MINPT-O-EOU	
18.04	12.11	11.03	5.93	2.83	MAS = 3.69 (m)	1220.00	1202.63					MinPt-O-SF	
172.67	63.94	129.71	108.73	4.09	OSF1.50	6750.00	6503.25					MinPt-O-SF	
206.66	62.85	164.43	143.81	4.99	OSF1.50	7410.00	7083.83	OSF>5.00				Exit Alert	
226.97	68.82	180.76	158.15	5.00	OSF1.50	8680.00	7286.32	OSF<5.00				Enter Alert	
226.12	226.47	74.81	-0.35	1.50	OSF1.50	13490.00	7267.84		OSF<1.50			Enter Minor	
225.82	291.42	31.20	-65.61	1.16	OSF1.50	15270.15	7261.00					MinPts	

#### Stugart 20N R2 mdv 10June20 (Def Plan)

Fail Minor

15.11	12.28	14.12	2.83	N/A	MAS = 3.74 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
15.11	12.28	14.12	2.83	N/A	MAS = 3.74 (m)	4.00	4.00					WRP	
15.11	12.28	12.88	2.83	11.34	MAS = 3.74 (m)	290.00	290.00					MinPt-O-SF	
15.10	12.28	12.88	2.83	11.34	MAS = 3.74 (m)	300.00	300.00					MINPT-O-EOU	
14.52	12.28	8.55	2.24	2.71	MAS = 3.74 (m)	1080.00	1068.44					MinPts	
14.66	12.28	6.30	2.38	2.55	MAS = 3.74 (m)	1120.00	1106.78					MINPT-O-EOU	
15.37	12.28	8.58	3.09	2.49	MAS = 3.74 (m)	1170.00	1154.70					MinPt-O-SF	
204.25	68.26	158.42	135.99	4.53	OSF1.50	6862.56	6611.13					MinPt-O-SF	
228.65	228.94	75.70	-0.29	1.50	OSF1.50	12900.00	7270.10	OSF<1.50				Enter Minor	
228.75	313.16	19.64	-84.41	1.09	OSF1.50	15270.15	7261.00					MinPts	

#### Stugart 21NA R2 mdv 10June20 (Def Plan)

Warning Alert

30.01	24.20	29.02	5.81	N/A	MAS = 7.38 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
30.01	24.20	29.02	5.81	N/A	MAS = 7.38 (m)	4.00	4.00					WRP	
30.01	24.20	27.78	5.81	23.31	MAS = 7.38 (m)	290.00	290.00					MinPt-O-SF	
30.00	24.20	27.78	5.80	23.31	MAS = 7.38 (m)	300.00	300.00					MINPT-O-EOU	
28.79	24.20	22.74	4.59	5.49	MAS = 7.38 (m)	1090.00	1078.02					MinPts	
28.96	24.20	22.52	4.76	5.13	MAS = 7.38 (m)	1130.00	1116.36					MINPT-O-EOU	
31.45	24.20	24.02	7.25	4.73	MAS = 7.38 (m)	1240.00	1221.80					MinPt-O-SF	
48.76	24.20	38.97	24.56	5.43	MAS = 7.38 (m)	1540.00	1509.36	CtCt<=15m>15.00				Exit Alert	
428.39	69.81	381.53	358.59	9.32	OSF1.50	6840.00	6589.51					MinPt-O-SF	
478.57	144.42	381.96	334.15	4.99	OSF1.50	10280.00	7280.17	OSF<5.00				Enter Alert	
472.44	315.08	262.06	157.37	2.25	OSF1.50	15270.00	7261.00					MinPt-CtCt	
472.44	315.09	262.06	157.36	2.25	OSF1.50	15270.15	7261.00					MinPts	

#### Stugart 17C R2 mdv 10June20 (Def Plan)

Warning Alert

29.76	24.00	28.78	5.76	N/A	MAS = 7.32 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
29.76	24.00	28.78	5.76	N/A	MAS = 7.32 (m)	4.00	4.00					WRP	
29.76	24.00	27.53	5.76	23.11	MAS = 7.32 (m)	290.00	290.00					MinPt-O-SF	
29.76	24.00	27.53	5.75	23.13	MAS = 7.32 (m)	300.00	300.00					MINPT-O-EOU	
28.90	24.00	24.60	4.90	8.42	MAS = 7.32 (m)	900.00	894.44					MinPts	
29.03	24.00	24.47	5.03	7.84	MAS = 7.32 (m)	930.00	923.63					MINPT-O-EOU	
35.58	24.00	29.40	11.57	6.66	MAS = 7.32 (m)	1130.00	1116.36					MinPt-O-SF	
48.89	24.00	40.88	24.88	6.82	MAS = 7.32 (m)	1370.00	1346.41	CtCt<=15m>15.00				Exit Alert	
407.03	63.60	364.30	343.43	9.73	OSF1.50	6862.56	6611.13					MinPt-O-SF	
455.31	137.55	363.28	317.76	4.99	OSF1.50	10330.00	7279.98	OSF<5.00				Enter Alert	
457.20	310.47	249.90	146.74	2.21	OSF1.50	15270.15	7261.00					MinPts	

#### Stugart 22N R2 mdv 10June20 (Def Plan)

Warning Alert

45.12	32.81	44.13	12.31	N/A	MAS = 10.00 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
45.12	32.81	44.13	12.31	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
45.11	32.81	42.88	12.30	35.44	MAS = 10.00 (m)	290.00	290.00					MinPt-O-SF	
45.11	32.81	42.88	12.30	35.44	MAS = 10.00 (m)	300.00	300.00					MINPT-O-EOU	
43.51	32.81	37.37	10.71	8.24	MAS = 10.00 (m)	1100.00	1087.61					MinPts	
43.73	32.81	37.19	10.92	7.70	MAS = 10.00 (m)	1140.00	1125.95					MINPT-O-EOU	
49.06	32.81	40.99	16.26	6.78	MAS = 10.00 (m)	1310.00	1288.90	CtCt<=15m>15.00				Exit Alert	
49.63	32.81	41.47	16.82	6.78	MAS = 10.00 (m)	1320.00	1298.48					MinPt-O-SF	
546.86	71.02	499.18	475.84	11.69	OSF1.50	6862.56	6611.13					MinPt-O-SF	
657.07	197.86	524.83	459.21	5.00	OSF1.50	12270.00	7272.53	OSF<5.00				Enter Alert	
657.06	304.97	453.42	352.09	3.24	OSF1.50	15260.00	7261.04					MinPt-CtCt	
657.06	305.38	453.15	351.89	3.23	OSF1.50	15270.15	7261.00					MinPts	

#### Stugart 16N R2 mdv 10June20 (Def Plan)

Warning Alert

44.88	32.81	43.90	12.07	N/A	MAS = 10.00 (m)	0.00	0.00	CtCt<=15m<15.00				Enter Alert	
44.87	32.81	43.89	12.06	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
44.87	32.81	42.64	12.06	35.36	MAS = 10.00 (m)	250.00	250.00					MinPts	
44.87	32.81	42.64	12.06	35.27	MAS = 10.00 (m)	260.00	260.00					MINPT-O-EOU	
44.87	32.81	42.64	12.07	35.25	MAS = 10.00 (m)	290.00	290.00					MinPt-O-SF	
44.87	32.81	42.64	12.06	35.25	MAS = 10.00 (m)	300.00	300.00					MINPT-O-EOU	
43.92	32.81	40.31	11.11	16.34	MAS = 10.00 (m)	820.00	816.25					MinPts	
44.08	32.81	40.14	11.27	14.56	MAS = 10.00 (m)	860.00	855.40					MINPT-O-EOU	



Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Stugart 23N R2 mdv 10June20 (Def Plan)	48.72	32.81	43.47	15.91	11.22	MAS = 10.00 (m)	1020.00	1010.76	CtCt<=15m>15.00			Exit Alert	
	66.79	32.81	59.64	33.99	10.68	MAS = 10.00 (m)	1270.00	1250.56		MinPt-O-SF			
	71.65	32.81	64.04	38.84	10.67	MAS = 10.00 (m)	1330.00	1308.07		MinPt-O-SF			
	85.88	32.81	76.99	53.07	10.76	MAS = 10.00 (m)	1500.00	1471.02		MinPt-O-SF			
	566.09	60.92	525.15	505.18	14.14	OSF1.50	6730.00	6484.08	MinPt-O-SF				
	657.07	69.29	610.55	587.78	14.41	OSF1.50	8210.00	7288.12	MinPt-CtCt				
	657.16	198.01	524.83	459.15	5.00	OSF1.50	12350.00	7272.22	Enter Alert				
	657.35	304.24	454.19	353.11	3.25	OSF1.50	15270.15	7261.00	MinPts				
Stugart 23N R2 mdv 10June20 (Def Plan)													
60.02	32.81	59.03	27.21	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
60.02	32.81	59.03	27.21	N/A	MAS = 10.00 (m)	4.00	4.00				WRP		
60.01	32.81	57.78	27.21	47.41	MAS = 10.00 (m)	290.00	290.00				MinPt-O-SF		
60.01	32.81	57.78	27.20	47.41	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU		
57.93	32.81	51.79	25.12	11.06	MAS = 10.00 (m)	1100.00	1087.61				MinPts		
58.10	32.81	51.57	25.29	10.30	MAS = 10.00 (m)	1140.00	1125.95				MINPT-O-EOU		
66.76	32.81	58.12	33.95	8.59	MAS = 10.00 (m)	1370.00	1346.41				MinPt-O-SF		
741.35	72.61	692.61	668.73	15.50	OSF1.50	6862.56	6611.13				MinPt-O-SF		
878.12	264.28	701.61	613.84	5.00	OSF1.50	14040.00	7265.73	OSF<5.00			Enter Alert		
877.98	308.20	672.19	569.78	4.28	OSF1.50	15260.00	7261.04		MinPt-CtCt				
877.99	308.59	671.93	569.39	4.28	OSF1.50	15270.15	7261.00		MinPts				
Stugart 15N R2 mdv 10June20 (Def Plan)													
59.78	32.81	58.80	26.97	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
59.77	32.81	58.79	26.96	N/A	MAS = 10.00 (m)	4.00	4.00				WRP		
59.77	32.81	57.55	26.96	47.37	MAS = 10.00 (m)	250.00	250.00				MinPts		
59.77	32.81	57.54	26.96	47.24	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU		
59.77	32.81	57.54	26.96	47.22	MAS = 10.00 (m)	290.00	290.00				MinPt-O-SF		
59.77	32.81	57.54	26.96	47.22	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU		
58.73	32.81	55.76	25.92	29.15	MAS = 10.00 (m)	740.00	737.61				MinPts		
58.89	32.81	55.62	26.08	25.28	MAS = 10.00 (m)	780.00	776.98				MINPT-O-EOU		
106.17	32.81	98.25	73.36	15.16	MAS = 10.00 (m)	1390.00	1365.58				MinPt-O-SF		
108.39	32.81	100.31	75.58	15.16	MAS = 10.00 (m)	1410.00	1384.75				MinPt-O-SF		
118.46	32.81	109.71	85.65	15.14	MAS = 10.00 (m)	1500.00	1471.02				MinPt-O-SF		
129.82	32.81	120.33	97.02	15.14	MAS = 10.00 (m)	1600.00	1566.87				MinPt-O-SF		
738.42	58.75	698.93	679.67	19.15	OSF1.50	6640.00	6397.81				MinPt-O-SF		
877.22	264.08	700.84	613.14	5.00	OSF1.50	14260.00	7264.88	OSF<5.00			Enter Alert		
877.02	301.27	675.85	575.75	4.38	OSF1.50	15270.15	7261.00		MinPts				
Calvin 1 Blind 0' to 7355' - PR (Def Survey)													
8349.37	32.81	8347.56	8316.56	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
8349.30	32.81	8347.41	8316.49	103537.57	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF		
1435.01	437.18	1140.70	997.84	4.99	OSF1.50	13830.00	7266.53	OSF<5.00			Enter Alert		
627.55	476.22	308.85	151.33	1.98	OSF1.50	15120.00	7261.58		MinPts				
627.62	476.30	308.91	151.32	1.98	OSF1.50	15130.00	7261.54				MinPts		
645.13	474.94	327.94	170.20	2.04	OSF1.50	15270.15	7261.00				TD		
UPV 21-11H6 Blind 0' to 7440' - AB (Def Survey)													
5988.16	32.81	5986.35	5555.35	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
5988.08	32.81	5986.18	5555.27	62512.49	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF		
5963.07	347.57	5130.82	5015.50	23.25	OSF1.50	6150.00	5928.13	OSF<5.00			MinPt-CtCt		
1439.70	435.66	1147.72	1004.03	4.99	OSF1.50	11320.00	7276.17		Enter Alert				
635.22	452.04	333.32	183.18	2.11	OSF1.50	12610.00	7271.22				MinPts		
1436.11	432.67	1147.13	1003.44	4.99	OSF1.50	13900.00	7266.26	OSF>5.00			Exit Alert		
2732.98	428.80	2446.58	2304.18	9.59	OSF1.50	15270.15	7261.00		TD				
UPRC 21-12H6 Blind 0' to 7502' - AB (Def Survey)													
4170.98	32.81	4169.17	4138.17	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
4170.89	32.81	4168.99	4138.09	44027.61	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF		
3932.08	313.19	3722.75	3618.89	18.92	OSF1.50	5530.00	5333.85	OSF<5.00			MinPt-CtCt		
1436.48	434.53	1145.76	1001.95	4.98	OSF1.50	9950.00	7281.44		Enter Alert				
750.82	443.44	454.66	307.38	2.54	OSF1.50	11170.00	7276.75				MinPt-CtCt		
750.82	443.45	454.65	307.37	2.54	OSF1.50	11180.00	7276.71				MinPts		
1437.06	433.69	1147.39	1003.36	4.98	OSF1.50	12400.00	7272.03	OSF>5.00			Exit Alert		
4163.71	429.38	3876.92	3734.33	14.59	OSF1.50	15270.15	7261.00		TD				
A.J. Gold 22-13 Blind 0' to 7426' - PR (Def Survey)													
9323.77	32.81	9321.96	9290.97	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
9323.70	32.81	9321.81	9290.89	117457.20	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF		
1420.42	434.52	1127.53	985.90	4.98	OSF1.50	14840.00	7262.65	OSF<5.00			Enter Alert		
1015.37	438.46	719.76	576.92	3.52	OSF1.50	15270.15	7261.00		MinPts				
Wiedeman R J 20-13 GYRO 0' to 7980' - PA (Def Survey)													
2380.75	32.81	2378.94	2347.94	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Warning Alert	
2380.72	32.81	2378.89	2347.92	103963.55	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF		
2379.76	32.81	2376.90	2346.95	2266.12	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF		
1159.45	346.57	927.72	812.88	5.04	OSF1.50	6920.00	6666.11				MinPt-CtCt		
1159.80	347.70	927.32	812.10	5.02	OSF1.50	6940.00	6685.17				MINPT-O-EOU		
1160.73	348.83	927.50	811.90	5.01	OSF1.50	6960.00	6704.17				MinPt-O-ADP		
1163.18	350.52	928.83	812.66	5.00	OSF1.50	6990.00	6732.51	OSF<5.00			Enter Alert		
1171.95	353.83	935.40	818.11	4.99	OSF1.50	7050.00	6788.46		MinPt-O-SF				
1183.17	356.54	944.84	826.63	5.00	OSF1.50	7100.00	6834.11	OSF>5.00			Exit Alert		
9113.48	382.04	8858.25	8731.44	35.93	OSF1.50	15270.15	7261.00		TD				
Stugart 24N R2 mdv 10June20 (Def Plan)													
75.13	32.81	74.14	42.32	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass	
75.13	32.81	74.14	42.32	N/A	MAS = 10.00 (m)	4.00	4.00				WRP		
75.12	32.81	72.89	42.31	59.54	MAS = 10.00 (m)	290.00	290.00				MinPt-O-SF		
75.12	32.81	72.89	42.31	59.54	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU		
72.68	32.81	66.36	39.77	13.68	MAS = 10.00 (m)	1110.00	1097.19				MinPts		
72.80	32.81	66.18	39.99	12.75	MAS = 10.00 (m)	1150.00	1135.53				MINPT-O-EOU		
85.46	32.81	76.27	52.65	10.30	MAS = 10.00 (m)	1430.00	1403.92				MinPt-O-SF		
888.31	73.78	838.80	814.54	18.28	OSF1.50	6862.56	6611.13				MinPt-O-SF		
1095.10	174.74	978.28	920.36	9.45	OSF1.50	11570.00	7275.21				MinPt-CtCt		
1095.16	305.21	891.36	789.96	5.39	OSF1.50	15270.15	7261.00				MinPts		
Stugart 14N R2 mdv 10June20 (Def Plan)													
													Pass

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Stugart 13NA R2 mdv 10June20 (Def Plan)	74.89	32.81	73.90	42.08	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	74.88	32.81	73.89	42.07	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	74.88	32.81	72.65	42.07	59.54	MAS = 10.00 (m)	250.00	250.00				MinPts	
	74.88	32.81	72.65	42.07	59.34	MAS = 10.00 (m)	290.00	290.00				MinPt-O-SF	
	74.87	32.81	72.64	42.06	59.35	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU	
	73.77	32.81	71.48	40.96	56.13	MAS = 10.00 (m)	650.00	648.70				MinPts	
	73.84	32.81	71.35	41.03	48.26	MAS = 10.00 (m)	680.00	678.39				MINPT-O-EOU	
	199.75	32.81	188.95	166.94	20.24	MAS = 10.00 (m)	1800.00	1758.57				MinPt-O-SF	
	950.09	58.80	919.56	900.29	24.86	OSF1.50	6760.00	6512.83				MinPt-O-SF	
	1095.21	302.32	893.33	792.89	5.45	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 07N R2 mdv 10June20 (Def Plan)	89.79	32.81	88.80	56.98	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	89.78	32.81	88.80	56.97	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	89.78	32.81	87.56	56.97	71.55	MAS = 10.00 (m)	250.00	250.00				MinPts	
	89.77	32.81	87.54	56.96	71.31	MAS = 10.00 (m)	290.00	290.00				MinPt-O-SF	
	89.77	32.81	87.54	56.96	71.32	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU	
	88.81	32.81	87.01	56.00	108.44	MAS = 10.00 (m)	580.00	579.27				MinPts	
	88.93	32.81	86.95	56.12	88.13	MAS = 10.00 (m)	610.00	609.05				MINPT-O-EOU	
	243.66	32.81	233.00	210.85	25.09	MAS = 10.00 (m)	1800.00	1758.57				MinPt-O-SF	
	1088.09	55.08	1051.04	1033.01	30.14	OSF1.50	6490.00	6254.03				MinPt-O-SF	
	1326.37	297.66	1127.60	1028.71	6.70	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 07N R2 mdv 10June20 (Def Plan)	99.72	32.81	98.74	66.91	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	99.72	32.81	98.74	66.91	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	99.72	32.81	97.49	66.91	79.36	MAS = 10.00 (m)	250.00	250.00				MinPts	
	99.75	32.81	97.49	66.94	77.44	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	204.78	32.81	199.28	171.97	45.10	MAS = 10.00 (m)	910.00	904.18				MinPt-O-SF	
	2382.79	56.11	2345.05	2326.68	64.81	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2639.74	304.57	2436.37	2335.18	13.04	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 08N R2 mdv 10June20 (Def Plan)	100.93	32.81	99.95	68.13	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	100.93	32.81	99.95	68.13	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	100.93	32.81	98.71	68.13	80.33	MAS = 10.00 (m)	250.00	250.00				MinPts	
	100.95	32.81	98.69	68.14	78.40	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	196.45	32.81	190.72	163.64	41.19	MAS = 10.00 (m)	950.00	943.06				MinPt-O-SF	
	2185.64	56.34	2147.75	2129.30	59.20	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2419.95	305.21	2216.14	2114.73	11.93	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 06N R2 mdv 10June20 (Def Plan)	100.94	32.81	99.96	68.14	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	100.94	32.81	99.96	68.14	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	100.94	32.81	98.72	68.14	80.34	MAS = 10.00 (m)	250.00	250.00				MinPts	
	100.97	32.81	98.71	68.16	78.39	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	205.72	32.81	200.52	172.91	48.50	MAS = 10.00 (m)	860.00	855.40				MinPt-O-SF	
	2566.69	55.97	2529.04	2510.71	69.99	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2857.91	304.76	2654.40	2553.15	14.11	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 05NA R2 mdv 10June20 (Def Plan)	104.18	32.81	103.20	71.37	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	104.18	32.81	103.20	71.37	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	104.18	32.81	101.95	71.37	82.94	MAS = 10.00 (m)	250.00	250.00				MinPts	
	104.21	32.81	101.95	71.40	80.93	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	189.74	32.81	185.08	156.93	51.34	MAS = 10.00 (m)	770.00	767.15				MinPt-O-SF	
	2776.78	55.90	2739.19	2720.86	75.82	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	3063.40	304.19	2860.28	2779.21	15.25	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 09C R2 mdv 10June20 (Def Plan)	104.53	32.81	103.54	71.72	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	104.53	32.81	103.54	71.72	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	104.53	32.81	102.30	71.72	83.22	MAS = 10.00 (m)	250.00	250.00				MinPts	
	104.56	32.81	102.27	71.75	79.47	MAS = 10.00 (m)	270.00	270.00				MINPT-O-EOU	
	192.85	32.81	186.74	160.04	37.48	MAS = 10.00 (m)	1020.00	1010.76				MinPt-O-SF	
	1987.42	56.64	1949.33	1930.78	53.54	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2203.24	307.25	1998.08	1895.99	10.79	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 10N R2 mdv 10June20 (Def Plan)	109.63	32.81	108.64	76.82	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	109.63	32.81	108.64	76.82	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	109.38	32.81	107.07	76.57	81.98	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	108.82	32.81	106.65	76.01	90.92	MAS = 10.00 (m)	380.00	379.96				MinPts	
	200.29	32.81	193.89	167.48	36.80	MAS = 10.00 (m)	1150.00	1135.53				MinPt-O-SF	
	1791.92	56.86	1753.68	1735.05	48.07	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	1963.03	307.56	1777.67	1675.49	9.70	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 04N R2 mdv 10June20 (Def Plan)	109.52	32.81	108.53	76.71	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	109.51	32.81	108.53	76.70	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	109.51	32.81	107.29	76.70	87.45	MAS = 10.00 (m)	250.00	250.00				MinPts	
	109.54	32.81	107.29	76.73	85.33	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	197.85	32.81	193.18	165.04	53.49	MAS = 10.00 (m)	770.00	767.15				MinPt-O-SF	
	2938.44	55.89	2900.85	2882.55	80.26	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	3209.65	59.33	3169.77	3150.32	82.49	OSF1.50	7510.00	7147.27				MinPt-O-SF	
	3296.49	304.89	3092.90	2991.60	16.27	OSF1.50	15270.15	7261.00				MinPts	
												Pass	
Stugart 11N R2 mdv 10June20 (Def Plan)	116.69	32.81	115.71	83.88	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	116.69	32.81	115.71	83.88	N/A	MAS = 10.00 (m)	4.00	4.00				WRP	
	116.47	32.81	114.23	83.66	91.67	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	114.04	32.81	112.31	81.23	151.18	MAS = 10.00 (m)	510.00	509.64				MinPts	
	114.08	32.81	112.26	81.27	136.08	MAS = 10.00 (m)	530.00	529.55				MINPT-O-EOU	
	286.93	32.81	277.45	254.12	33.68	MAS = 10.00 (m)	1650.00	1614.79				MinPt-O-SF	
	1592.50	57.13	1554.08	1535.37	42.52	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	1762.90	306.13	1558.49	1456.77	8.66	OSF1.50	15270.15	7261.00				MinPts	
												Pass	



Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status	
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major			
Stugart 03N R2 mdv 10June20 (Def Plan)														Pass
	116.47	32.81	115.48	83.66	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	116.46	32.81	115.48	83.65	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
	116.46	32.81	114.24	83.65	93.05	MAS = 10.00 (m)	250.00	250.00					MinPts	
	116.49	32.81	114.24	83.68	90.79	MAS = 10.00 (m)	260.00	260.00					MINPT-O-EOU	
	213.20	32.81	208.41	180.39	55.79	MAS = 10.00 (m)	790.00	786.81					MinPt-O-SF	
	3101.52	55.90	3063.93	3045.63	84.70	OSF1.50	6862.56	6611.13					MinPt-O-SF	
	3514.95	305.24	3311.12	3209.71	17.32	OSF1.50	15270.15	7261.00					MinPts	
Stugart 12N R2 mdv 10June20 (Def Plan)														Pass
	124.91	32.81	123.93	92.10	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	124.91	32.81	123.93	92.10	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
	124.82	32.81	122.58	92.01	99.03	MAS = 10.00 (m)	290.00	290.00					MinPt-O-SF	
	119.93	32.81	117.57	87.12	86.51	MAS = 10.00 (m)	650.00	648.70					MinPts	
	120.04	32.81	117.41	87.23	72.55	MAS = 10.00 (m)	690.00	688.27					MINPT-O-EOU	
	252.79	32.81	242.93	219.98	28.37	MAS = 10.00 (m)	1690.00	1653.13					MinPt-O-SF	
	1360.87	56.58	1322.83	1304.29	36.69	OSF1.50	6740.00	6493.66					MinPt-O-SF	
	1545.72	303.73	1342.90	1241.99	7.65	OSF1.50	15270.15	7261.00					MinPts	
Stugart State 02C R2 mdv 10June20 (Def Plan)														Pass
	124.87	32.81	123.88	92.06	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	124.86	32.81	123.88	92.05	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
	124.86	32.81	122.64	92.05	99.82	MAS = 10.00 (m)	250.00	250.00					MinPts	
	124.89	32.81	122.64	92.08	97.40	MAS = 10.00 (m)	260.00	260.00					MINPT-O-EOU	
	229.47	32.81	224.56	196.66	58.22	MAS = 10.00 (m)	810.00	806.44					MinPt-O-SF	
	3265.86	56.23	3228.04	3209.63	88.65	OSF1.50	6900.00	6647.00					MinPt-O-SF	
	3736.13	305.52	3532.13	3430.62	18.40	OSF1.50	15270.15	7261.00					MinPts	
Stugart State 01N R2 mdv 10June20 (Def Plan)														Pass
	134.44	32.81	133.46	101.64	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	134.44	32.81	133.46	101.63	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
	134.44	32.81	132.53	101.63	143.99	MAS = 10.00 (m)	200.00	200.00					MinPts	
	134.50	32.81	132.47	101.69	127.00	MAS = 10.00 (m)	220.00	220.00					MINPT-O-EOU	
	256.15	32.81	251.10	223.35	62.64	MAS = 10.00 (m)	830.00	826.05					MinPt-O-SF	
	3468.02	56.26	3430.19	3411.76	94.08	OSF1.50	6900.00	6647.00					MinPt-O-SF	
	3953.47	305.89	3749.21	3647.58	19.44	OSF1.50	15270.15	7261.00					MinPts	
Lundvall 11-20 MWD 0' to 7810' - PR (Def Survey)														Pass
	2368.40	32.81	2366.59	2335.59	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	2368.38	32.81	2366.55	2335.57	126242.85	MAS = 10.00 (m)	4.00	4.00					MinPt-O-SF	
	2274.34	32.81	2267.52	2241.53	455.44	MAS = 10.00 (m)	1020.00	1010.76					MinPt-O-SF	
	1812.70	32.81	1800.56	1779.89	175.52	MAS = 10.00 (m)	2580.00	2506.22					MinPt-O-SF	
	1468.64	32.81	1453.89	1435.83	115.21	MAS = 10.00 (m)	3290.00	3186.77					MinPt-O-SF	
	275.98	50.35	241.88	225.64	8.44	OSF1.50	5770.00	5563.90					MinPt-CICt	
	276.07	50.55	241.83	225.52	8.41	OSF1.50	5780.00	5573.48					MINPT-O-EOU	
	276.26	50.75	241.89	225.51	8.38	OSF1.50	5790.00	5583.07					MinPt-O-ADP	
	280.09	51.96	244.92	228.13	8.30	OSF1.50	5860.00	5650.16					MinPt-O-SF	
	8169.52	60.06	8128.95	8109.46	209.60	OSF1.50	15270.15	7261.00					TD	
Wiedeman 20-20 GYRO 0' to 7542' - AB (Def Survey)														Pass
	2411.00	32.81	2409.19	2378.19	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	2410.91	32.81	2408.99	2378.10	23262.00	MAS = 10.00 (m)	4.00	4.00					MinPt-O-SF	
	1459.38	49.99	1425.52	1409.39	45.20	OSF1.50	6830.00	6579.93					MinPt-CICt	
	296.16	59.80	255.76	236.36	7.59	OSF1.50	8710.00	7286.20					MinPt-O-SF	
	295.93	59.72	255.59	236.21	7.60	OSF1.50	8720.00	7286.16					MinPts	
	6554.99	51.31	6520.25	6503.68	197.78	OSF1.50	15270.15	7261.00					TD	
Stugart 6-20 Blind 0' to 7610' - PR (Def Survey)														Pass
	357.49	32.81	355.68	324.68	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	357.36	32.81	355.42	324.55	2850.12	MAS = 10.00 (m)	4.00	4.00					MinPt-O-SF	
	357.22	32.81	347.00	324.42	42.25	MAS = 10.00 (m)	250.00	250.00					MinPts	
	359.90	32.81	344.45	327.09	26.26	MAS = 10.00 (m)	380.00	379.96					MINPT-O-EOU	
	2128.10	402.87	1858.99	1725.23	7.94	OSF1.50	6970.00	6713.64					MinPt-O-SF	
	8559.28	435.39	8268.49	8123.90	29.59	OSF1.50	15270.15	7261.00					TD	
Stugart 22-20 MWD 0' to 7735' - PR (Def Survey)														Pass
	367.22	32.81	365.41	334.41	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	367.22	32.81	365.41	334.41	N/A	MAS = 10.00 (m)	4.00	4.00					WRP	
	367.22	32.81	364.32	334.41	333.56	MAS = 10.00 (m)	250.00	250.00					MinPts	
	367.24	32.81	364.30	334.43	325.48	MAS = 10.00 (m)	260.00	260.00					MINPT-O-EOU	
	445.95	32.81	439.57	413.14	97.30	MAS = 10.00 (m)	970.00	962.44					MinPt-O-SF	
	640.05	32.81	629.46	607.24	71.10	MAS = 10.00 (m)	2050.00	1998.20					MinPt-O-SF	
	1160.28	48.78	1127.23	1111.50	36.84	OSF1.50	5980.00	5765.19					MinPt-O-SF	
	8883.62	59.27	8843.57	8824.35	231.04	OSF1.50	15270.15	7261.00					TD	
HSR-Wiedeman 9-20 GYRO 0' to 7473' - AB (Def Survey)														Pass
	2906.97	32.81	2905.16	2874.16	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	2906.87	32.81	2904.94	2874.06	25137.52	MAS = 10.00 (m)	4.00	4.00					MinPt-O-SF	
	2903.94	32.81	2901.06	2871.13	2738.00	MAS = 10.00 (m)	300.00	300.00					MinPt-O-SF	
	2452.76	43.48	2423.24	2409.28	87.80	OSF1.50	6180.00	5956.89					MinPt-CICt	
	2453.06	44.42	2422.91	2408.64	85.88	OSF1.50	6300.00	6071.91					MINPT-O-EOU	
	2453.25	44.65	2422.95	2408.60	85.44	OSF1.50	6330.00	6100.67					MinPt-O-ADP	
	537.53	78.44	484.70	459.08	10.46	OSF1.50	9680.00	7282.47					MinPt-O-SF	
	537.36	78.41	484.55	458.95	10.46	OSF1.50	9690.00	7282.44					MinPts	
	5598.99	49.45	5565.49	5549.54	175.48	OSF1.50	15270.15	7261.00					TD	
HSR-Wiedeman 16-20 GYRO 0' to 7501' - AB (Def Survey)														Pass
	3585.20	32.81	3583.39	3552.39	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
	3585.18	32.81	3583.34	3552.37	141496.60	MAS = 10.00 (m)	4.00	4.00					MinPt-O-SF	
	3584.21	32.81	3581.21	3551.41	3009.40	MAS = 10.00 (m)	300.00	300.00					MinPt-O-SF	
	561.74	85.20	503.73	476.54	10.26	OSF1.50	9770.00	7282.13					MinPt-CICt	
	561.94	86.00	503.43	475.94	10.16	OSF1.50	9790.00	7282.05					MINPT-O-EOU	
	562.31	86.38	503.56	475.93	10.11	OSF1.50	9800.00	7282.01					MinPt-O-ADP	
	571.58	88.73	511.41	482.84	9.94	OSF1.50	9880.00	7281.71					MinPt-O-SF	
	5523.87	63.42	5481.06	5460.46	134.01	OSF1.50	15270.15	7261.00					TD	

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
UPRC 21-14H6 GYRO 0' to 7418' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	5780.55	32.81	5778.74	5747.74		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	5780.46	32.81	5778.55	5747.66	59339.30	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	5778.83	32.81	5776.04	5746.02	5951.82	MAS = 10.00 (m)	2100.00	2046.13				MinPt-O-SF	
	5602.35	32.81	5590.86	5569.54	570.03	MAS = 10.00 (m)	12410.00	7271.99				MinPt-CtCt	
	583.83	149.06	483.27	434.76	5.98	OSF1.50	12420.00	7271.95				MINPT-O-EOU	
	583.87	149.45	483.09	434.42	5.96	OSF1.50	12430.00	7271.91				MinPt-O-ADP	
	584.08	149.80	483.10	434.29	5.95	OSF1.50	12470.00	7271.76				MinPt-O-SF	
	586.65	150.79	485.14	435.86	5.92	OSF1.50	15270.15	7261.00				TD	
	2915.63	75.74	2864.61	2839.89	58.96	OSF1.50							
HSR-Wiedeman 15-20 GYRO 0' to 7527' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	2753.55	32.81	2751.74	2720.75		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	2753.49	32.81	2751.60	2720.68	37547.67	MAS = 10.00 (m)	50.00	50.00				MinPts	
	2753.13	32.81	2751.21	2720.32	26910.28	MAS = 10.00 (m)	80.00	80.00				MINPT-O-EOU	
	2753.18	32.81	2751.19	2720.37	15290.28	MAS = 10.00 (m)	390.00	389.94				MinPt-O-SF	
	2753.87	32.81	2750.77	2721.06	2140.17	MAS = 10.00 (m)	460.00	459.81				MinPt-O-SF	
	2750.47	32.81	2747.30	2717.66	2034.11	MAS = 10.00 (m)	8270.00	7287.89				MinPt-CtCt	
	611.12	61.05	569.26	550.08	15.84	OSF1.50	8280.00	7287.85				MinPts	
	611.16	61.21	569.19	549.95	15.79	OSF1.50	8380.00	7287.47				MinPt-O-SF	
	620.50	62.82	577.55	557.68	15.53	OSF1.50	15270.15	7261.00				TD	
	7024.09	61.40	6982.62	6962.68	176.15	OSF1.50							
Wiedeman 21-15H6 GYRO 0' to 7491' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	7018.87	32.81	7017.05	6986.06		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	7018.79	32.81	7016.88	6985.98	78615.38	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	7017.07	32.81	7014.32	6984.26	7463.01	MAS = 10.00 (m)	4460.00	4308.24				MinPts	
	6690.53	32.81	6670.78	6657.73	369.18	MAS = 10.00 (m)	4500.00	4346.58				MINPT-O-EOU	
	6690.62	32.81	6670.69	6657.81	365.27	MAS = 10.00 (m)	13840.00	7266.49				MinPt-CtCt	
	653.69	180.28	532.26	473.41	5.52	OSF1.50	13850.00	7266.46				MinPts	
	653.84	180.62	532.22	473.22	5.51	OSF1.50	13890.00	7266.30				MinPt-O-SF	
	655.97	181.58	533.85	474.39	5.49	OSF1.50	15270.15	7261.00				TD	
	1576.92	112.64	1501.29	1464.27	21.28	OSF1.50							
UPRC 21-13H6 GYRO 0' to 7440' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	4640.46	32.81	4638.64	4607.65		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	4640.37	32.81	4638.45	4607.56	46033.32	MAS = 10.00 (m)	110.00	110.00				MinPts	
	4639.22	32.81	4637.15	4606.41	17989.77	MAS = 10.00 (m)	250.00	250.00				MINPT-O-EOU	
	4639.42	32.81	4636.68	4606.61	4987.81	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	4639.29	32.81	4636.51	4606.49	4758.60	MAS = 10.00 (m)	10950.00	7277.60				MinPt-CtCt	
	770.09	112.61	693.82	657.48	10.55	OSF1.50	10960.00	7277.56				MINPT-O-EOU	
	770.18	112.96	693.69	657.22	10.51	OSF1.50	10970.00	7277.52				MinPt-O-ADP	
	770.40	113.29	693.71	657.11	10.48	OSF1.50	11070.00	7277.13				MinPt-O-SF	
	779.67	115.74	701.54	663.94	10.33	OSF1.50	15270.15	7261.00				TD	
	4390.03	72.59	4341.10	4317.44	92.73	OSF1.50							
HSR-Wiedeman 14-20 GYRO 0' to 7527' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	2628.32	32.81	2626.51	2595.52		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	2628.29	32.81	2626.44	2595.48	75166.78	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	2627.50	32.81	2624.58	2594.69	2373.69	MAS = 10.00 (m)	2410.00	2343.27				MinPt-O-SF	
	2140.07	32.81	2129.18	2107.26	235.01	MAS = 10.00 (m)	7410.00	7083.83				MinPts	
	772.41	50.47	737.65	721.94	24.49	OSF1.50	7460.00	7116.81				MinPt-O-SF	
	774.36	50.60	739.54	723.76	24.43	OSF1.50	15270.15	7261.00				TD	
	8049.36	61.17	8008.04	7988.19	202.66	OSF1.50							
HSR-Wiedeman 10-20 GYRO 0' to 7535' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1631.75	32.81	1629.94	1598.94		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1631.64	32.81	1629.72	1598.84	14287.59	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	1630.06	32.81	1627.16	1597.25	1496.01	MAS = 10.00 (m)	4970.00	4797.08				MinPts	
	1046.84	32.81	1024.62	1014.04	50.69	MAS = 10.00 (m)	5000.00	4825.84				MINPT-O-EOU	
	1046.93	32.81	1024.56	1014.12	50.34	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	1158.12	46.31	1126.71	1111.81	38.81	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	1162.34	46.48	1130.81	1115.85	38.79	OSF1.50	8270.00	7287.89				MinPts	
	794.99	52.95	759.14	742.03	23.18	OSF1.50	8340.00	7287.62				MinPt-O-SF	
	798.22	53.41	762.08	744.82	23.07	OSF1.50	15270.15	7261.00				TD	
	7046.42	48.26	7013.71	6998.16	226.47	OSF1.50							
Wiedeman 25-20 GYRO 0' to 7638' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1748.70	32.81	1746.89	1715.89		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1748.61	32.81	1746.69	1715.80	17252.17	MAS = 10.00 (m)	3850.00	3723.54				MinPt-CtCt	
	802.88	33.55	779.97	769.33	37.65	OSF1.50	4010.00	3876.90				MinPt-CtCt	
	802.57	35.06	778.66	767.51	35.92	OSF1.50	4130.00	3991.92				MINPT-O-EOU	
	803.01	36.30	778.27	766.70	34.64	OSF1.50	4140.00	4001.51				MinPt-O-ADP	
	803.08	36.40	778.28	766.68	34.56	OSF1.50	4710.00	4547.87				MinPt-O-SF	
	860.38	40.76	832.67	819.61	32.89	OSF1.50	7720.00	7244.77				MinPt-CtCt	
	1355.06	55.79	1317.33	1299.26	37.46	OSF1.50	7730.00	7248.09				MINPT-O-EOU	
	1355.07	55.85	1317.31	1299.23	37.43	OSF1.50	7740.00	7251.29				MinPt-O-ADP	
	1355.12	55.90	1317.31	1299.22	37.39	OSF1.50	8130.00	7288.43				MinPt-O-SF	
	1385.22	58.49	1345.70	1326.74	36.48	OSF1.50	15270.15	7261.00				TD	
	7523.59	62.54	7481.36	7461.05	185.17	OSF1.50							
Wiedeman PMJ 21-9 GYRO 0' to 7490' - AB (Def Survey)													
					N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	7932.79	32.81	7930.98	7899.99		MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	7932.73	32.81	7930.85	7899.92	114534.34	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	7931.46	32.81	7928.63	7898.65	7745.48	MAS = 10.00 (m)	5010.00	4835.42				MinPt-CtCt	
	7798.89	34.44	7775.39	7764.45	356.23	OSF1.50	5230.00	5046.30				MinPt-CtCt	
	7799.01	35.88	7774.55	7763.13	341.34	OSF1.50	5300.00	5113.39				MINPT-O-EOU	
	7799.15	36.35	7774.38	7762.80	336.59	OSF1.50	5340.00	5151.73				MinPt-O-ADP	
	7799.37	36.63	7774.42	7762.74	333.93	OSF1.50	6800.00	6551.17				MinPt-CtCt	
	7780.58	48.88	7747.46	7731.70	246.82	OSF1.50	14990.00	7262.08				MinPt-CtCt	
	962.69	209.66	822.38	753.03	6.93	OSF1.50	15000.00	7262.04				MinPts	
	962.69	209.76	822.32	752.94	6.93	OSF1.50	15020.00	7261.96				MinPt-O-SF	
	963.01	209.88	822.55	753.13	6.92	OSF1.50	15270.15	7261.00				TD	
	1001.28	204.66	864.30	796.61	7.38	OSF1.50							

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Wiedeman-PM J21-10 GYRO 0' to 7495' - AB (Def Survey)													
	6707.93	32.81	6706.12	6675.12	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	6707.86	32.81	6705.97	6675.05	84691.42	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6706.84	32.81	6704.72	6674.03	22191.72	MAS = 10.00 (m)	120.00	120.00				MinPts	
	6706.98	32.81	6704.23	6674.17	7190.04	MAS = 10.00 (m)	250.00	250.00				MINPT-O-EOU	
	6707.04	32.81	6704.21	6674.23	6631.05	MAS = 10.00 (m)	300.00	300.00				MinPts	
	6645.53	32.81	6633.36	6612.72	629.66	MAS = 10.00 (m)	2110.00	2055.71				MinPt-O-SF	
	6619.93	32.81	6607.09	6587.13	590.63	MAS = 10.00 (m)	2670.00	2592.48				MinPt-O-SF	
	6577.82	32.81	6560.43	6545.01	416.79	MAS = 10.00 (m)	4000.00	3867.32				MinPts	
	6577.91	32.81	6560.35	6545.11	412.17	MAS = 10.00 (m)	4040.00	3905.66				MINPT-O-EOU	
	6532.00	34.86	6508.22	6497.14	294.61	OSF1.50	5340.00	5151.73				MinPt-CtCt	
	6532.11	35.15	6508.14	6496.96	292.00	OSF1.50	5380.00	5190.07				MINPT-O-EOU	
	6532.23	35.30	6508.16	6496.93	290.72	OSF1.50	5400.00	5209.24				MinPt-O-ADP	
	6540.44	39.80	6513.37	6500.63	256.76	OSF1.50	6010.00	5793.94				MinPt-O-ADP	
	6545.70	43.23	6516.35	6502.47	235.83	OSF1.50	6450.00	6215.69				MinPt-CtCt	
	6545.97	44.03	6516.08	6501.94	231.38	OSF1.50	6550.00	6311.54				MINPT-O-EOU	
	6546.92	45.17	6516.27	6501.74	225.35	OSF1.50	6690.00	6445.73				MinPt-O-ADP	
	989.48	176.65	871.18	812.83	8.47	OSF1.50	13760.00	7266.80				MinPt-CtCt	
	989.54	176.74	871.17	812.79	8.46	OSF1.50	13770.00	7266.76				MinPts	
	989.96	176.89	871.50	813.07	8.46	OSF1.50	13790.00	7266.69				MinPt-O-SF	
	1805.88	112.80	1730.14	1693.08	24.34	OSF1.50	15270.15	7261.00				TD	
Stugart 3-20 Blind 0' to 7580' - PR (Def Survey)													
	1258.14	32.81	1256.30	1225.33	47356.55	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1258.14	32.81	1256.19	1225.33	9546.93	MAS = 10.00 (m)	4.00	4.00				WRP	
	1258.14	32.81	1247.08	1225.33	135.91	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1260.63	32.81	1244.73	1227.82	89.38	MAS = 10.00 (m)	370.00	369.96				MINPT-O-EOU	
	3200.27	431.59	2912.01	2768.68	11.16	OSF1.50	7570.00	7180.32				MinPt-O-SF	
	8588.90	439.20	8295.56	8149.69	29.44	OSF1.50	15270.15	7261.00				TD	
Bensler J 29-27D GYRO 0' to 7588' - PR (Def Survey)													
	4275.98	32.81	4274.16	4243.17	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	4275.92	32.81	4274.04	4243.11	65996.24	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	4271.99	32.81	4268.94	4239.18	3472.15	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	1290.03	73.19	1239.96	1216.83	27.81	OSF1.50	8990.00	7285.13				MinPt-CtCt	
	1290.22	73.63	1239.87	1216.59	27.62	OSF1.50	9010.00	7285.05				MINPT-O-EOU	
	1290.44	73.86	1239.94	1216.58	27.53	OSF1.50	9020.00	7285.01				MinPt-O-ADP	
	1354.42	81.15	1299.32	1273.27	25.93	OSF1.50	9400.00	7283.55				MinPt-O-SF	
	6413.88	82.32	6358.46	6331.56	119.17	OSF1.50	15270.15	7261.00				TD	
Wiedeman 40-20 GYRO 0' to 7935' - AB (Def Survey)													
	1769.72	32.81	1767.91	1736.91	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1769.63	32.81	1767.71	1736.82	16807.71	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1766.17	32.81	1762.98	1733.36	1285.84	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	1688.89	32.81	1677.74	1656.08	180.64	MAS = 10.00 (m)	1700.00	1662.72				MinPts	
	1689.05	32.81	1677.55	1656.24	174.31	MAS = 10.00 (m)	1740.00	1701.06				MINPT-O-EOU	
	2241.82	32.81	2220.13	2209.01	111.51	MAS = 10.00 (m)	4180.00	4039.85				MinPt-O-SF	
	2597.89	38.24	2571.87	2559.65	106.30	OSF1.50	5020.00	4845.01				MinPt-O-SF	
	3340.73	59.64	3300.44	3281.10	86.31	OSF1.50	6860.00	6608.68				MinPt-O-ADP	
	1324.00	118.21	1244.65	1205.78	17.01	OSF1.50	10430.00	7279.59				MinPt-CtCt	
	1324.12	118.58	1244.53	1205.54	16.96	OSF1.50	10450.00	7279.52				MINPT-O-EOU	
	1324.30	118.76	1244.59	1205.54	16.94	OSF1.50	10460.00	7279.48				MinPt-O-ADP	
	1333.42	120.61	1252.47	1212.80	16.79	OSF1.50	10590.00	7278.98				MinPt-O-SF	
	5014.45	85.51	4956.91	4928.94	89.62	OSF1.50	15270.15	7261.00				TD	
Barnett 5-20 Blind 0' to 7622' - PR (Def Survey)													
	1329.65	32.81	1327.16	1296.84	1955.77	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1329.65	32.81	1327.08	1296.84	1750.76	MAS = 10.00 (m)	4.00	4.00				WRP	
	1329.65	32.81	1318.46	1296.84	141.55	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1340.69	65.48	1296.43	1275.21	31.54	OSF1.50	1090.00	1078.02				MINPT-O-EOU	
	1357.22	85.26	1299.78	1271.96	24.36	OSF1.50	1430.00	1403.92				MinPt-O-ADP	
	2288.53	404.93	2018.04	1883.60	8.51	OSF1.50	6970.00	6713.64				MinPt-O-SF	
	9617.41	437.11	9325.47	9180.30	33.12	OSF1.50	15270.15	7261.00				TD	
SW Greeley 31-20 MWD 0' to 7695' - PR (Def Survey)													
	1359.88	32.81	1357.99	1327.08	17244.75	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1359.88	32.81	1357.98	1327.07	15481.57	MAS = 10.00 (m)	4.00	4.00				WRP	
	1359.57	32.81	1356.31	1326.76	940.09	MAS = 10.00 (m)	340.00	339.99				MinPts	
	1360.11	32.81	1356.00	1327.30	589.93	MAS = 10.00 (m)	560.00	559.40				MINPT-O-EOU	
	1468.92	32.81	1457.39	1436.11	147.94	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	3135.71	50.54	3101.48	3085.17	96.06	OSF1.50	6930.00	6675.65				MinPt-O-SF	
	3154.59	50.84	3120.17	3103.75	96.06	OSF1.50	6990.00	6732.51				MinPt-O-SF	
	3165.03	51.00	3130.50	3114.03	96.06	OSF1.50	7020.00	6760.63				MinPt-O-SF	
	10319.05	65.44	10274.89	10253.61	242.43	OSF1.50	15270.15	7261.00				TD	
Wiedeman 24-20 GYRO 0' to 7660' - AB (Def Survey)													
	1657.28	32.81	1655.47	1624.47	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	1657.18	32.81	1655.25	1624.37	15106.96	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1380.55	32.81	1366.01	1347.74	106.64	MAS = 10.00 (m)	2550.00	2477.46				MinPts	
	1380.65	32.81	1365.62	1347.84	102.74	MAS = 10.00 (m)	2650.00	2573.31				MinPts	
	1380.70	32.81	1365.55	1347.89	101.78	MAS = 10.00 (m)	2680.00	2602.07				MINPT-O-EOU	
	1663.46	35.71	1639.12	1627.75	73.09	OSF1.50	4540.00	4384.92				MinPt-O-SF	
	2057.30	50.83	2022.88	2006.47	62.65	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	1390.50	68.87	1344.05	1321.63	30.97	OSF1.50	8940.00	7285.32				MinPt-CtCt	
	1390.57	69.01	1344.03	1321.56	30.91	OSF1.50	8950.00	7285.28				MinPts	
	1413.50	71.71	1365.15	1341.79	30.21	OSF1.50	9190.00	7284.36				MinPt-O-SF	
	6484.28	62.22	6442.27	6422.06	160.43	OSF1.50	15270.15	7261.00				TD	
Lundvall 12-20 MWD 0' to 7703' - PR (Def Survey)													
	2350.46	32.81	2348.64	2317.65	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	Pass
	2350.44	32.81	2348.60	2317.63	126404.23	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1381.09	38.68	1354.75	1342.40	55.87	OSF1.50	4900.00	4729.98				MinPt-CtCt	
	1381.16	38.89	1354.68	1342.26	55.54	OSF1.50	4920.00	4749.15				MINPT-O-EOU	
	1381.24	38.99	1354.70	1342.25	55.39	OSF1.50	4930.00	4758.74				MinPt-O-ADP	
	1536.23	47.89	1503.77	1488.35	49.74	OSF1.50	6010.00	5793.94				MinPt-O-SF	
	1571.95	49.46	1538.44	1522.49	49.22	OSF1.50	6150.00	5928.13				MinPt-O-SF	
	1608.47	50.56	1574.23	1557.91	49.24	OSF1.50	6300.00	6071.91				MinPt-O-SF	
	1664.90	52.40	1629.43	1612.50	49.12	OSF1.50	6520.00	6282.79				MinPt-O-SF	

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
	1688.11	53.52	1661.90	1644.59	49.02	OSF1.50	6660.00	6416.98				MinPt-O-SF	
	1741.69	55.00	1704.49	1686.69	48.89	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	9663.26	58.06	9624.02	9605.20	256.71	OSF1.50	15270.15	7261.00				TD	
Meyer 4 GYRO 0' to 8410' - PR (Def Survey)													Pass
	3848.91	32.81	3847.10	3816.10	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	3848.88	32.81	3847.05	3816.08	158256.69	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3846.06	32.81	3842.77	3813.26	2994.33	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	3845.95	32.81	3842.65	3813.14	2589.14	MAS = 10.00 (m)	340.00	339.99				MinPts	
	1467.05	140.69	1372.77	1326.41	15.81	OSF1.50	11890.00	7273.98				MinPt-CtCt	
	1467.11	140.76	1372.73	1326.35	15.80	OSF1.50	11900.00	7273.95				MinPts	
	1468.61	141.08	1374.02	1327.53	15.78	OSF1.50	11960.00	7273.72				MinPt-O-SF	
	3681.76	99.13	3615.14	3582.63	56.60	OSF1.50	15270.15	7261.00				TD	
Hurst 7-20 MWD 0' to 7650' - PR (Def Survey)													Pass
	1678.49	32.81	1676.68	1645.69	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1678.45	32.81	1676.60	1645.65	42430.16	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1678.39	32.81	1675.38	1645.58	1402.42	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1678.43	32.81	1675.36	1645.62	1333.31	MAS = 10.00 (m)	270.00	270.00				MINPT-O-EOU	
	1730.41	32.81	1724.19	1697.60	392.16	MAS = 10.00 (m)	970.00	962.44				MinPt-O-SF	
	1740.92	32.81	1734.73	1708.11	397.17	MAS = 10.00 (m)	1050.00	1039.64				MinPt-O-SF	
	1739.71	32.81	1786.40	1765.90	167.78	MAS = 10.00 (m)	2400.00	2333.68				MinPts	
	1798.73	32.81	1786.39	1765.92	167.36	MAS = 10.00 (m)	2410.00	2343.27				MINPT-O-EOU	
	1798.85	32.81	1785.46	1766.04	152.50	MAS = 10.00 (m)	2690.00	2611.65				MinPts	
	1798.93	32.81	1785.42	1766.12	151.06	MAS = 10.00 (m)	2720.00	2640.41				MINPT-O-EOU	
	1798.66	32.81	1784.42	1765.85	142.33	MAS = 10.00 (m)	2880.00	2793.77				MinPts	
	1798.72	32.81	1784.37	1765.91	141.00	MAS = 10.00 (m)	2910.00	2822.53				MINPT-O-EOU	
	2246.10	50.54	2211.87	2195.56	68.79	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2254.46	50.72	2220.12	2203.75	68.80	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	2104.41	59.51	2064.21	2044.91	54.47	OSF1.50	8460.00	7287.16				MinPt-CtCt	
	2104.51	59.74	2064.15	2044.77	54.26	OSF1.50	8480.00	7287.08				MinPts	
	2214.73	67.02	2169.51	2147.71	50.75	OSF1.50	9150.00	7284.51				MinPt-O-SF	
	7127.47	72.72	7078.45	7054.75	150.29	OSF1.50	15270.15	7261.00				TD	
Hurst 8-20 MWD 0' to 7840' - PR (Def Survey)													Pass
	1700.06	32.81	1698.25	1667.25	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1700.02	32.81	1698.17	1667.21	44848.06	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1699.15	32.81	1695.18	1665.34	1465.32	MAS = 10.00 (m)	280.00	280.00				MinPts	
	1698.16	32.81	1695.17	1665.35	1448.20	MAS = 10.00 (m)	290.00	290.00				MINPT-O-EOU	
	1698.19	32.81	1695.19	1665.38	1431.27	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	1698.41	32.81	1695.41	1665.60	1431.65	MAS = 10.00 (m)	330.00	329.99				MinPt-O-SF	
	3130.47	64.41	3087.00	3066.06	74.73	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	2253.13	86.61	2194.86	2166.52	39.73	OSF1.50	9660.00	7282.55				MinPt-CtCt	
	2253.23	86.84	2194.80	2166.39	39.62	OSF1.50	9680.00	7282.47				MinPts	
	2301.86	91.31	2240.45	2210.55	38.44	OSF1.50	10130.00	7280.75				MinPt-O-SF	
	6038.12	88.77	5978.41	5949.35	103.88	OSF1.50	15270.15	7261.00				TD	
Greeley 21-20 Blind 0' to 7619' - PR (Def Survey)													Pass
	1720.66	32.81	1718.84	1687.85	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1720.62	32.81	1718.76	1687.81	43436.49	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1720.55	32.81	1710.99	1687.74	221.90	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1724.24	32.81	1707.12	1691.43	112.56	MAS = 10.00 (m)	440.00	439.86				MINPT-O-EOU	
	3032.83	437.75	2740.47	2695.08	10.43	OSF1.50	8540.00	7286.85				MinPts	
	3033.00	437.80	2740.61	2695.21	10.42	OSF1.50	8570.00	7286.74				MinPt-O-SF	
	7383.86	439.29	7090.47	6944.57	25.30	OSF1.50	15270.15	7261.00				TD	
Greeley 21-20 MWD 0' to 7619' - PR (Def Survey)													Pass
	1721.14	32.81	1719.33	1688.33	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1721.13	32.81	1719.32	1688.32	651847.29	MAS = 10.00 (m)	4.00	4.00				WRP	
	1721.13	32.81	1718.24	1688.32	1595.50	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1721.14	32.81	1718.23	1688.33	1557.45	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	1776.47	32.81	1770.53	1743.66	429.56	MAS = 10.00 (m)	990.00	981.80				MinPt-O-SF	
	2597.58	49.67	2563.93	2547.91	81.01	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	2653.58	50.71	2619.24	2602.87	81.01	OSF1.50	7200.00	6921.80				MinPt-O-SF	
	2926.40	64.22	2883.05	2862.18	70.06	OSF1.50	9090.00	7284.74				MinPt-O-SF	
	2942.39	64.57	2898.81	2877.82	70.05	OSF1.50	9130.00	7284.59				MinPt-O-SF	
	7810.89	77.68	7758.57	7733.21	153.98	OSF1.50	15270.15	7261.00				TD	
Greeley 17-20 MWD 0' to 7675' - PR (Def Survey)													Pass
	1741.87	32.81	1740.05	1709.06	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1741.86	32.81	1740.04	1709.05	667649.47	MAS = 10.00 (m)	4.00	4.00				WRP	
	1741.86	32.81	1738.97	1709.05	1614.37	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1741.87	32.81	1738.95	1709.06	1575.86	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	1783.42	32.81	1777.65	1750.61	450.80	MAS = 10.00 (m)	880.00	874.93				MinPt-O-SF	
	1981.67	32.81	1970.29	1948.86	202.61	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	2016.74	32.81	2005.23	1983.93	203.45	MAS = 10.00 (m)	2050.00	1998.20				MinPt-O-SF	
	3227.81	51.58	3192.89	3176.24	96.83	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	2797.36	71.06	2749.46	2726.30	60.38	OSF1.50	9220.00	7284.24				MinPt-CtCt	
	2797.55	71.52	2749.34	2726.04	59.99	OSF1.50	9250.00	7284.13				MINPT-O-EOU	
	2797.69	71.67	2749.37	2726.02	59.86	OSF1.50	9260.00	7284.09				MinPt-O-ADP	
	2985.13	84.49	2928.27	2900.65	53.99	OSF1.50	10260.00	7280.25				MinPt-O-SF	
	6663.98	93.32	6601.23	6570.65	108.96	OSF1.50	15270.15	7261.00				TD	
Greeley 27-20 GYRO 0' to 7712' - PR (Def Survey)													Pass
	1763.36	32.81	1761.55	1730.56	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1763.33	32.81	1761.48	1730.52	50273.22	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	1762.93	32.81	1760.40	1730.12	2439.25	MAS = 10.00 (m)	190.00	190.00				MinPts	
	1762.99	32.81	1760.21	1730.18	1817.22	MAS = 10.00 (m)	250.00	250.00				MinPts	
	2069.26	32.81	2058.48	2036.46	225.26	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	4117.94	72.78	4068.88	4045.16	86.75	OSF1.50	9010.00	7285.05				MinPt-CtCt	
	4118.16	73.37	4068.72	4044.80	86.05	OSF1.50	9050.00	7284.89				MINPT-O-EOU	
	4118.42	73.66	4068.75	4044.76	85.71	OSF1.50	9070.00	7284.82				MinPt-O-ADP	
	4651.41	101.89	4582.95	4549.52	69.55	OSF1.50	11170.00	7276.75				MinPt-O-SF	
	7495.55	119.60	7415.28	7375.95	95.27	OSF1.50	15270.15	7261.00				TD	
SW Greeley 18-20 MWD 0' to 7700' - PR (Def Survey)													Pass
	1850.38	32.81	1848.50	1817.58	26618.14	MAS = 10.00 (m)	0.00	0.00				Surface	
	1850.38	32.81	1848.49	1817.58	23598.50	MAS = 10.00 (m)	4.00	4.00				WRP	
	1850.35	32.81	1847.36	1817.55	1522.98	MAS = 10.00 (m)	250.00	250.00				MinPts	

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Barnett 1-20 GYRO 0' to 7625' - PR (Def Survey)	1850.40	32.81	1847.34	1817.59	1484.91	MAS = 10.00 (m)	260.00	260.00				MINPT-O-EOU	
	2077.27	32.81	2066.63	2044.46	229.61	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	2780.10	50.76	2745.72	2729.34	84.78	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	9305.05	72.44	9256.22	9232.61	196.99	OSF1.50	15270.15	7261.00				TD	
Barnett 1-20 GYRO 0' to 7625' - PR (Def Survey)													Pass
	1884.49	32.81	1882.59	1851.68	22601.71	MAS = 10.00 (m)	0.00	0.00				MinPts	
	1884.49	32.81	1882.58	1851.68	20007.51	MAS = 10.00 (m)	4.00	4.00				WRP	
	1884.60	32.81	1882.55	1851.79	7878.19	MAS = 10.00 (m)	50.00	50.00				MINPT-O-EOU	
	1885.35	32.81	1882.28	1852.55	1491.21	MAS = 10.00 (m)	250.00	250.00				MINPT-O-EOU	
	1885.44	32.81	1882.32	1852.63	1449.48	MAS = 10.00 (m)	270.00	270.00				MinPt-O-SF	
	2153.38	32.81	2142.80	2120.57	239.85	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	3382.42	46.94	3350.60	3335.49	111.87	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	10053.34	72.81	10004.27	9980.54	211.76	OSF1.50	15270.15	7261.00				TD	
Meyer 3 GYRO 0' to 7745' - AB (Def Survey)													Pass
	3835.63	32.81	3833.82	3802.82	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	3835.61	32.81	3833.77	3802.80	161959.91	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3835.24	32.81	3832.82	3802.43	6328.89	MAS = 10.00 (m)	170.00	170.00				MinPts	
	3835.38	32.81	3832.70	3802.57	4402.88	MAS = 10.00 (m)	230.00	230.00				MINPT-O-EOU	
	3835.82	32.81	3833.00	3803.01	3820.57	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	4206.84	63.70	4163.83	4143.13	101.58	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	1942.68	118.16	1863.37	1824.52	24.98	OSF1.50	11110.00	7276.98				MinPt-CiCt	
	1942.79	118.52	1863.25	1824.28	24.91	OSF1.50	11130.00	7276.90				MINPT-O-EOU	
	1942.93	118.69	1863.26	1824.23	24.87	OSF1.50	11140.00	7276.87				MinPt-O-ADP	
	1970.58	122.86	1888.14	1847.72	24.36	OSF1.50	11440.00	7275.71				MinPt-O-SF	
	4588.95	104.57	4518.70	4484.38	66.83	OSF1.50	15270.15	7261.00				TD	
Lessor J 21-7X GYRO 0' to 7725' - AB (Def Survey)													Pass
	6892.70	32.81	6890.88	6859.89	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6892.66	32.81	6890.80	6859.85	153859.67	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6892.32	32.81	6890.36	6859.51	46991.60	MAS = 10.00 (m)	70.00	70.00				MinPts	
	6892.45	32.81	6890.28	6859.64	19382.70	MAS = 10.00 (m)	130.00	130.00				MINPT-O-EOU	
	6894.64	32.81	6891.82	6861.83	6832.68	MAS = 10.00 (m)	320.00	319.99				MinPt-O-SF	
	6790.25	54.89	6753.12	6735.36	191.19	OSF1.50	4810.00	4643.72				MinPt-CiCt	
	6787.97	57.88	6748.85	6730.10	180.97	OSF1.50	5150.00	4969.61				MinPt-CiCt	
	6788.10	58.23	6748.75	6729.88	179.82	OSF1.50	5210.00	5027.13				MINPT-O-EOU	
	6788.26	58.40	6748.78	6729.85	179.25	OSF1.50	5240.00	5055.88				MinPt-O-ADP	
	1945.88	185.82	1821.47	1760.06	15.83	OSF1.50	13890.00	7266.30				MinPt-CiCt	
	1946.06	186.36	1821.28	1759.70	15.79	OSF1.50	13920.00	7266.19				MINPT-O-EOU	
	1946.22	186.53	1821.33	1759.69	15.77	OSF1.50	13930.00	7266.15				MinPt-O-ADP	
	1955.74	188.68	1829.42	1767.07	15.67	OSF1.50	14090.00	7265.53				MinPt-O-SF	
	2383.08	177.45	2264.24	2205.63	20.31	OSF1.50	15270.15	7261.00				TD	
Hayes 2-20 Blind 0' to 7627' - PR (Def Survey)													Pass
	1947.50	32.81	1945.69	1914.69	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	1947.48	32.81	1945.66	1914.68	173169.43	MAS = 10.00 (m)	4.00	4.00				WRP	
	1947.48	32.81	1937.40	1914.67	235.28	MAS = 10.00 (m)	250.00	250.00				MinPts	
	1950.83	32.81	1933.97	1918.02	129.56	MAS = 10.00 (m)	420.00	419.90				MINPT-O-EOU	
	3321.27	438.44	3028.45	2882.84	11.40	OSF1.50	8590.00	7286.66				MinPts	
	3321.55	438.50	3028.68	2883.05	11.40	OSF1.50	8630.00	7286.51				MinPt-O-SF	
	7463.00	441.23	7168.31	7021.77	25.46	OSF1.50	15270.15	7261.00				TD	
Hayes 1 Blind 0' to 9502' - AB (Def Survey)													Pass
	2601.43	32.81	2599.62	2568.62	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	2601.34	32.81	2599.42	2568.53	25247.24	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	2600.64	32.81	2582.62	2567.83	160.42	MAS = 10.00 (m)	520.00	519.60				MinPts	
	2618.92	100.48	2551.33	2518.44	39.79	OSF1.50	1790.00	1748.99				MINPT-O-EOU	
	2623.92	108.30	2551.18	2515.62	36.86	OSF1.50	1930.00	1883.18				MINPT-O-EOU	
	2654.91	145.37	2557.46	2509.54	27.68	OSF1.50	2580.00	2506.22				MinPt-O-ADP	
	2067.52	438.46	1774.66	1629.03	7.09	OSF1.50	9790.00	7282.05				MinPts	
	2067.67	438.54	1774.77	1629.12	7.09	OSF1.50	9810.00	7281.98				MinPt-O-SF	
	5861.76	434.73	5571.40	5427.03	20.29	OSF1.50	15270.15	7261.00				TD	
Meyer 1 Blind 0' to 7482' - AB (Def Survey)													Pass
	5229.71	32.81	5227.90	5196.90	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	5229.65	32.81	5227.77	5196.84	76232.83	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	5227.93	55.61	5190.25	5172.32	145.72	OSF1.50	1040.00	1030.03				MinPt-CiCt	
	5275.83	198.58	5142.90	5077.24	40.16	OSF1.50	3530.00	3416.81				MINPT-O-EOU	
	5338.29	273.44	5155.46	5064.85	29.45	OSF1.50	4830.00	4662.89				MinPt-O-ADP	
	2085.54	452.23	1783.52	1633.31	6.94	OSF1.50	12410.00	7271.99				MinPt-CiCt	
	2085.54	452.29	1783.49	1633.26	6.94	OSF1.50	12420.00	7271.95				MINPT-O-EOU	
	2085.60	452.34	1783.50	1633.26	6.94	OSF1.50	12430.00	7271.91				MinPt-O-ADP	
	2086.04	452.50	1783.84	1633.54	6.93	OSF1.50	12460.00	7271.80				MinPt-O-SF	
	3536.47	444.08	3239.88	3092.39	11.98	OSF1.50	15270.15	7261.00				TD	
Lessor 7-21 Blind 0' to 7508' - AB (Def Survey)													Pass
	6547.42	32.81	6545.61	6514.61	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6547.36	32.81	6545.48	6514.55	96329.89	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6544.75	64.36	6501.24	6480.39	156.91	OSF1.50	1210.00	1193.04				MinPt-CiCt	
	6604.86	243.47	6442.01	6361.39	40.95	OSF1.50	4330.00	4183.63				MINPT-O-EOU	
	6683.26	337.44	6457.77	6345.82	29.84	OSF1.50	5960.00	5746.02				MinPt-O-ADP	
	2094.10	462.46	1785.25	1631.64	6.81	OSF1.50	13730.00	7266.92				MinPt-CiCt	
	2094.11	462.53	1785.22	1631.58	6.81	OSF1.50	13740.00	7266.88				MINPT-O-EOU	
	2094.18	462.60	1785.24	1631.58	6.81	OSF1.50	13750.00	7266.84				MinPt-O-ADP	
	2094.91	462.85	1785.81	1632.06	6.81	OSF1.50	13790.00	7266.69				MinPt-O-SF	
	2598.44	458.23	2292.42	2140.21	8.53	OSF1.50	15270.15	7261.00				TD	
Lessor J 21-8 - Plan (Def Plan)													Pass
	6934.01	32.81	6932.20	6901.21	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6933.98	32.81	6932.13	6901.17	196079.84	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6933.77	32.81	6930.89	6900.96	6473.25	MAS = 10.00 (m)	250.00	250.00				MinPts	
	6933.84	32.81	6930.82	6901.03	5723.65	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU	
	7001.72	32.81	6988.53	6968.91	604.23	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	2115.92	200.91	1981.45	1915.01	15.91	OSF1.50	14580.00	7263.65				MinPt-CiCt	
	2116.04	201.25	1981.34	1914.79	15.89	OSF1.50	14600.00	7263.57				MINPT-O-EOU	
	2116.16	201.41	1981.36	1914.76	15.87	OSF1.50	14610.00	7263.54				MinPt-O-ADP	
	2125.53	203.52	1989.32	1922.02	15.78	OSF1.50	14780.00	7262.88				MinPt-O-SF	
	2226.22	203.32	2090.14	2022.90	16.54	OSF1.50	15270.15	7261.00				TD	

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Meyer 5 GYRO 0' to 7665' - AB (Def Survey)													
	3866.32	32.81	3864.51	3833.51	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	3866.30	32.81	3864.46	3833.49	156726.47	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3866.24	32.81	3864.37	3833.43	65574.02	MAS = 10.00 (m)	30.00	30.00				MinPts	
	3866.69	32.81	3863.84	3833.88	3726.76	MAS = 10.00 (m)	250.00	250.00				MINPT-O-EOU	
	3866.90	32.81	3863.99	3834.09	3536.37	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	2680.70	134.75	2590.34	2545.95	30.18	OSF1.50	11840.00	7274.18				MinPt-CtCt	
	2680.87	135.31	2590.13	2545.56	30.06	OSF1.50	11870.00	7274.06				MINPT-O-EOU	
	2681.16	135.67	2590.18	2545.49	29.98	OSF1.50	11890.00	7273.98				MinPt-O-ADP	
	2734.44	142.67	2638.79	2591.77	29.06	OSF1.50	12380.00	7272.10				MinPt-O-SF	
	4352.84	133.82	4263.10	4219.02	49.37	OSF1.50	15270.15	7261.00				TD	
Lesser J 21-18D MWD 0' to 7595' - SI (Def Survey)													
	6736.38	32.81	6734.57	6703.57	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	6736.35	32.81	6734.50	6703.54	178451.02	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6736.12	32.81	6734.18	6703.31	54129.64	MAS = 10.00 (m)	60.00	60.00				MinPts	
	6736.29	32.81	6733.52	6703.48	7035.86	MAS = 10.00 (m)	250.00	250.00				MINPT-O-EOU	
	6736.46	32.81	6733.62	6703.66	6515.32	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	6275.84	40.03	6248.49	6235.82	247.62	OSF1.50	5050.00	4873.76				MinPt-CtCt	
	6275.90	40.20	6248.43	6235.70	246.49	OSF1.50	5080.00	4902.52				MINPT-O-EOU	
	6275.95	40.26	6248.43	6235.69	246.12	OSF1.50	5090.00	4912.10				MinPt-O-ADP	
	2684.95	163.82	2575.20	2521.13	24.81	OSF1.50	13180.00	7269.03				MinPt-CtCt	
	2685.14	164.43	2574.99	2520.72	24.72	OSF1.50	13210.00	7268.91				MINPT-O-EOU	
	2685.45	164.82	2575.04	2520.64	24.67	OSF1.50	13230.00	7268.84				MinPt-O-ADP	
	2724.38	171.00	2609.84	2553.38	24.11	OSF1.50	13640.00	7267.26				MinPt-O-SF	
	3403.44	166.63	3291.82	3236.81	30.92	OSF1.50	15270.15	7261.00				TD	
Lesser J 21-17 - Plan (Def Plan)													
	6911.99	32.81	6910.18	6879.18	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	6911.96	32.81	6910.11	6879.15	194836.18	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6911.75	32.81	6908.87	6878.94	6452.23	MAS = 10.00 (m)	250.00	250.00				MinPts	
	6911.82	32.81	6908.80	6879.01	5705.03	MAS = 10.00 (m)	300.00	300.00				MINPT-O-EOU	
	6942.52	32.81	6933.36	6909.71	945.27	MAS = 10.00 (m)	1280.00	1260.14				MinPt-O-SF	
	6942.13	32.81	6930.60	6909.32	714.49	MAS = 10.00 (m)	1790.00	1748.99				MINPT-O-EOU	
	6942.12	32.81	6930.60	6909.32	706.09	MAS = 10.00 (m)	1810.00	1768.16				MinPts	
	6947.62	32.81	6928.97	6914.81	407.64	MAS = 10.00 (m)	3590.00	3474.32				MINPT-O-EOU	
	6947.80	32.81	6928.97	6914.99	403.21	MAS = 10.00 (m)	3620.00	3503.08				MINPT-O-EOU	
	6957.75	39.49	6930.89	6916.26	275.45	OSF1.50	4810.00	4643.72				MinPt-O-ADP	
	7104.21	50.03	7070.32	7054.18	220.02	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	2850.59	179.81	2730.19	2670.79	23.98	OSF1.50	13850.00	7266.46				MinPt-CtCt	
	2850.85	180.61	2729.91	2670.24	23.88	OSF1.50	13890.00	7266.30				MINPT-O-EOU	
	2851.19	181.00	2729.99	2670.19	23.83	OSF1.50	13910.00	7266.23				MinPt-O-ADP	
	2888.77	187.12	2763.49	2701.66	23.34	OSF1.50	14320.00	7264.65				MinPt-O-SF	
	3183.92	188.51	3057.71	2995.40	25.54	OSF1.50	15270.15	7261.00				TD	
Meyer 2 GYRO 0' to 8010' - AB (Def Survey)													
	3819.75	32.81	3817.93	3786.94	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	3819.72	32.81	3817.89	3786.91	160621.02	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3818.83	32.81	3815.83	3786.02	3239.58	MAS = 10.00 (m)	280.00	280.00				MinPts	
	3818.84	32.81	3815.81	3786.03	3122.87	MAS = 10.00 (m)	300.00	300.00				MinPts	
	3820.09	32.81	3816.64	3787.29	2331.29	MAS = 10.00 (m)	460.00	459.81				MINPT-O-EOU	
	3787.24	33.01	3764.69	3754.22	180.90	OSF1.50	3720.00	3598.93				MinPt-CtCt	
	3787.26	33.12	3764.64	3754.13	180.25	OSF1.50	3740.00	3618.10				MINPT-O-EOU	
	3787.29	33.18	3764.64	3754.12	179.92	OSF1.50	3750.00	3627.69				MinPt-O-ADP	
	4220.32	50.88	4185.87	4169.44	128.42	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	2884.86	97.65	2819.23	2787.21	45.03	OSF1.50	10540.00	7279.17				MinPt-CtCt	
	2885.07	98.21	2819.06	2786.86	44.77	OSF1.50	10570.00	7279.06				MINPT-O-EOU	
	2885.38	98.57	2819.13	2786.81	44.61	OSF1.50	10590.00	7278.98				MinPt-O-ADP	
	3008.85	110.10	2934.91	2898.75	41.58	OSF1.50	11390.00	7275.91				MinPt-O-SF	
	5544.18	109.16	5470.87	5435.02	77.30	OSF1.50	15270.15	7261.00				TD	
Hayes 1-20 Blind 0' to 7516' - PR (Def Survey)													
	3060.85	32.81	3059.03	3028.04	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	3060.84	32.81	3059.02	3028.03	478542.90	MAS = 10.00 (m)	4.00	4.00				WRP	
	3060.83	32.81	3051.04	3028.03	383.15	MAS = 10.00 (m)	250.00	250.00				MinPts	
	3066.01	32.81	3045.90	3033.20	167.50	MAS = 10.00 (m)	510.00	509.64				MINPT-O-EOU	
	3071.92	36.40	3047.06	3035.53	133.16	OSF1.50	630.00	628.89				MinPt-O-ADP	
	3424.40	442.04	3129.18	2982.37	11.66	OSF1.50	9880.00	7281.71				MinPt-CtCt	
	3424.42	442.07	3129.17	2982.35	11.66	OSF1.50	9890.00	7281.67				MinPts	
	3425.37	442.29	3129.97	2983.08	11.65	OSF1.50	9960.00	7281.40				MinPt-O-SF	
	6387.17	445.46	6089.66	5941.71	21.58	OSF1.50	15270.15	7261.00				TD	
Lesser 1 Blind 0' to 7846' - AB (Def Survey)													
	7633.40	32.81	7631.59	7600.59	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	7633.36	32.81	7631.50	7600.55	171096.88	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	7632.99	32.81	7626.24	7600.18	1543.44	MAS = 10.00 (m)	250.00	250.00				MinPts	
	7662.76	84.40	7605.89	7578.36	139.14	OSF1.50	1530.00	1499.77				MINPT-O-EOU	
	7673.20	99.55	7606.23	7573.65	117.73	OSF1.50	1790.00	1748.99				MinPt-O-ADP	
	7750.43	188.54	7624.20	7561.89	62.18	OSF1.50	3350.00	3244.28				MinPt-O-ADP	
	3090.55	473.91	2774.08	2616.64	9.81	OSF1.50	14740.00	7263.04				MinPt-CtCt	
	3090.58	474.00	2774.05	2616.58	9.81	OSF1.50	14750.00	7263.00				MINPT-O-EOU	
	3090.64	474.08	2774.05	2616.56	9.81	OSF1.50	14760.00	7262.96				MinPt-O-ADP	
	3094.37	475.12	2777.09	2619.25	9.80	OSF1.50	14890.00	7262.46				MinPt-O-SF	
	3136.31	477.27	2817.59	2659.04	9.89	OSF1.50	15270.15	7261.00				TD	
Meyer 8 GYRO 0' to 7678' - AB (Def Survey)													
	3913.15	32.81	3911.34	3880.35	N/A	MAS = 10.00 (m)	0.00	0.00				Pass	Surface
	3913.13	32.81	3911.29	3880.32	160547.25	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3911.19	32.81	3907.99	3878.38	2828.32	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	3911.15	32.81	3907.98	3878.34	2843.53	MAS = 10.00 (m)	330.00	329.99				MinPts	
	4685.27	50.03	4651.38	4635.24	146.07	OSF1.50	6900.00	6647.00				MinPt-O-SF	
	3242.11	104.14	3172.15	3137.97	47.41	OSF1.50	10810.00	7278.13				MinPt-CtCt	
	3242.35	104.99	3171.88	3137.42	47.05	OSF1.50	10850.00	7277.98				MINPT-O-EOU	
	3242.66	105.32	3171.91	3137.34	46.88	OSF1.50	10870.00	7277.90				MinPt-O-ADP	
	3404.67	120.23	3232.98	3284.43	43.03	OSF1.50	11850.00	7274.14				MinPt-O-SF	
	5513.45	123.88	5430.33	5389.57	67.62	OSF1.50	15270.15	7261.00				TD	
Lesser PM J 21-1 Blind 0' to 7510' - PR (Def Survey)													
												Pass	



Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
Lesser PM J 21-2 Blind 0' to 7507' - PR (Def Survey)	8045.20	32.81	8043.39	8012.39	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	8045.16	32.81	8043.31	8012.36	204304.61	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	8044.86	32.81	8037.90	8012.06	1560.57	MAS = 10.00 (m)	250.00	250.00				MinPts	
	8064.29	65.51	8020.01	7998.78	189.85	OSF1.50	1200.00	1183.46				MINPT-O-EOU	
	8088.85	99.87	8021.67	7988.99	123.71	OSF1.50	1790.00	1748.99				MinPt-O-ADP	
	8156.68	175.66	8039.04	7981.02	70.28	OSF1.50	3120.00	3023.82				MinPt-O-ADP	
	3254.18	478.48	2934.67	2775.71	10.23	OSF1.50	15130.00	7261.54				MinPt-CiCt	
	3254.26	478.66	2934.62	2775.60	10.23	OSF1.50	15150.00	7261.46				MINPT-O-EOU	
	3254.34	478.75	2934.64	2775.60	10.23	OSF1.50	15160.00	7261.42				MinPt-O-ADP	
	3257.30	479.68	2936.98	2777.62	10.22	OSF1.50	15270.15	7261.00				MinPt-O-SF	
Lesser PM J 21-2 Blind 0' to 7507' - PR (Def Survey)													Pass
Lesser J 21-8 Blind 0' to 7838' - PR (Def Survey)	6930.10	32.81	6928.29	6897.30	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6930.06	32.81	6928.21	6897.26	155534.54	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6929.73	32.81	6922.68	6896.92	1321.88	MAS = 10.00 (m)	250.00	250.00				MinPts	
	6942.28	48.75	6909.17	6893.52	221.78	OSF1.50	910.00	904.18				MINPT-O-EOU	
	6987.41	98.85	6920.91	6888.56	107.99	OSF1.50	1770.00	1729.82				MinPt-O-ADP	
	3374.23	466.42	3062.75	2907.81	10.88	OSF1.50	13970.00	7265.99				MinPt-CiCt	
	3374.28	466.58	3062.69	2907.70	10.88	OSF1.50	13990.00	7265.92				MINPT-O-EOU	
	3374.35	466.66	3062.71	2907.69	10.88	OSF1.50	14000.00	7265.88				MinPt-O-ADP	
	3378.92	467.78	3066.54	2911.14	10.87	OSF1.50	14150.00	7265.30				MinPt-O-SF	
	3615.36	471.71	3300.35	3143.65	11.53	OSF1.50	15270.15	7261.00				TD	
Lesser J 21-17 Blind 0' to 7578' - SI (Def Survey)													Pass
Meyer 6 GYRO 0' to 8410' - AB (Def Survey)	6914.23	32.81	6912.42	6881.42	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6914.19	32.81	6912.33	6881.38	154822.66	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6913.88	32.81	6906.80	6881.05	1318.67	MAS = 10.00 (m)	250.00	250.00				MinPts	
	6926.52	48.75	6893.41	6877.77	221.27	OSF1.50	910.00	904.18				MINPT-O-EOU	
	6969.71	96.52	6904.76	6873.19	110.36	OSF1.50	1730.00	1691.48				MinPt-O-ADP	
	3381.91	466.23	3070.56	2915.69	10.91	OSF1.50	13950.00	7266.07				MinPt-CiCt	
	3381.95	466.38	3070.49	2915.56	10.91	OSF1.50	13970.00	7265.99				MINPT-O-EOU	
	3382.01	466.47	3070.50	2915.54	10.91	OSF1.50	13980.00	7265.96				MinPt-O-ADP	
	3386.48	467.59	3074.22	2918.89	10.90	OSF1.50	14130.00	7265.38				MinPt-O-SF	
	3628.95	471.57	3314.04	3157.39	11.58	OSF1.50	15270.15	7261.00				TD	
Meyer 6 GYRO 0' to 8410' - AB (Def Survey)													Pass
Meyer 7 GYRO 0' to 8146' - PR (Def Survey)	3881.82	32.81	3880.01	3849.01	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	3881.80	32.81	3879.96	3848.99	157986.03	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3881.59	32.81	3879.15	3848.69	7260.40	MAS = 10.00 (m)	150.00	150.00				MinPts	
	3881.64	32.81	3879.00	3848.83	4688.47	MAS = 10.00 (m)	210.00	210.00				MINPT-O-EOU	
	3882.61	32.81	3879.73	3849.80	3625.81	MAS = 10.00 (m)	300.00	300.00				MinPt-O-SF	
	4131.95	32.81	4120.12	4099.14	403.80	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	4166.31	32.81	4154.39	4133.50	403.75	MAS = 10.00 (m)	2020.00	1969.45				MinPt-O-SF	
	4160.47	60.06	4119.90	4100.41	158.04	OSF1.50	7050.00	6788.46				MinPts	
	3520.40	154.07	3417.15	3366.33	34.62	OSF1.50	12450.00	7271.83				MinPt-CiCt	
	3520.73	155.09	3416.80	3365.64	34.39	OSF1.50	12500.00	7271.64				MINPT-O-EOU	
	3521.06	155.49	3416.86	3365.57	34.31	OSF1.50	12520.00	7271.56				MinPt-O-ADP	
	3623.42	167.65	3511.12	3455.77	32.72	OSF1.50	13310.00	7268.53				MinPt-O-SF	
	4509.37	171.20	4394.71	4338.17	39.87	OSF1.50	15270.15	7261.00				TD	
Meyer 7 GYRO 0' to 8146' - PR (Def Survey)													Pass
Lesser J 21-28D GYRO 0' to 7573' - SI (Def Survey)	3898.18	32.81	3896.36	3865.37	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	3898.15	32.81	3896.32	3865.35	161473.44	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	3895.93	32.81	3892.80	3863.12	2958.62	MAS = 10.00 (m)	290.00	290.00				MinPts	
	3895.93	32.81	3892.79	3863.12	2922.78	MAS = 10.00 (m)	300.00	300.00				MinPts	
	4149.35	32.81	4137.94	4116.54	422.91	MAS = 10.00 (m)	1900.00	1854.42				MinPt-O-SF	
	5773.10	53.53	5736.88	5719.57	166.72	OSF1.50	6290.00	6062.33				MinPts	
	5870.69	56.13	5832.73	5814.55	161.45	OSF1.50	6862.56	6611.13				MinPt-O-SF	
	4020.47	131.07	3932.55	3889.40	46.56	OSF1.50	11720.00	7274.64				MinPt-CiCt	
	4020.83	132.12	3932.21	3888.71	46.19	OSF1.50	11770.00	7274.45				MINPT-O-EOU	
	4021.35	132.74	3932.31	3888.60	45.98	OSF1.50	11800.00	7274.33				MinPt-O-ADP	
	4226.64	152.21	4124.63	4074.43	42.08	OSF1.50	13020.00	7269.64				MinPt-O-SF	
	5366.16	160.61	5258.55	5205.55	50.61	OSF1.50	15270.15	7261.00				TD	
Lesser J 21-28D GYRO 0' to 7573' - SI (Def Survey)													Pass
Lesser J 21-27D GYRO 0' to 7585' - PR (Def Survey)	6713.78	32.81	6711.97	6680.97	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6713.74	32.81	6711.89	6680.93	153848.20	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6713.13	32.81	6710.23	6680.32	6203.77	MAS = 10.00 (m)	260.00	260.00				MinPt-O-SF	
	6713.12	32.81	6710.22	6680.31	6212.29	MAS = 10.00 (m)	270.00	270.00				MinPts	
	6682.17	32.81	6665.23	6649.36	435.70	MAS = 10.00 (m)	2680.00	2602.07				MinPts	
	6682.21	32.81	6665.19	6649.41	433.31	MAS = 10.00 (m)	2710.00	2630.82				MINPT-O-EOU	
	6702.86	32.81	6682.20	6670.05	351.83	MAS = 10.00 (m)	3450.00	3340.13				MINPT-O-EOU	
	3996.42	163.42	3888.95	3835.01	37.05	OSF1.50	13160.00	7269.11				MinPt-CiCt	
	3998.78	164.47	3888.59	3834.30	36.81	OSF1.50	13210.00	7268.91				MINPT-O-EOU	
	3999.29	165.10	3888.69	3834.19	36.68	OSF1.50	13240.00	7268.80				MinPt-O-ADP	
	4132.25	180.37	4011.47	3951.88	34.66	OSF1.50	14200.00	7265.11				MinPt-O-SF	
	4522.54	186.85	4397.44	4335.69	36.61	OSF1.50	15270.15	7261.00				TD	
Lesser J 21-27D GYRO 0' to 7585' - PR (Def Survey)													Pass
Lesser J 21-27D GYRO 0' to 7585' - PR (Def Survey)	6759.16	32.81	6757.35	6726.35	N/A	MAS = 10.00 (m)	0.00	0.00				Surface	
	6759.12	32.81	6757.27	6726.31	156908.13	MAS = 10.00 (m)	4.00	4.00				MinPt-O-SF	
	6758.82	32.81	6756.86	6726.01	46055.36	MAS = 10.00 (m)	70.00	70.00				MinPts	
	6758.86	32.81	6756.00	6726.05	6461.69	MAS = 10.00 (m)	270.00	270.00				MinPts	
	8037.74	53.02	8001.86	7984.72	234.43	OSF1.50	6370.00	6139.01				MinPts	
	4009.36	195.53	3878.47	3813.83	31.00	OSF1.50	14430.00	7264.23				MinPt-CiCt	
	4009.83	196.82	3878.08	3813.00	30.80	OSF1.50	14490.00	7264.00				MINPT-O-EOU	
4010.18	197.24	3878.15	3812.94	30.73	OSF1.50	14510.00	7263.92				MinPt-O-ADP		
4096.64	209.94	3956.21	3886.80	29.50	OSF1.50	15270.15	7261.00				MinPt-O-SF		

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		